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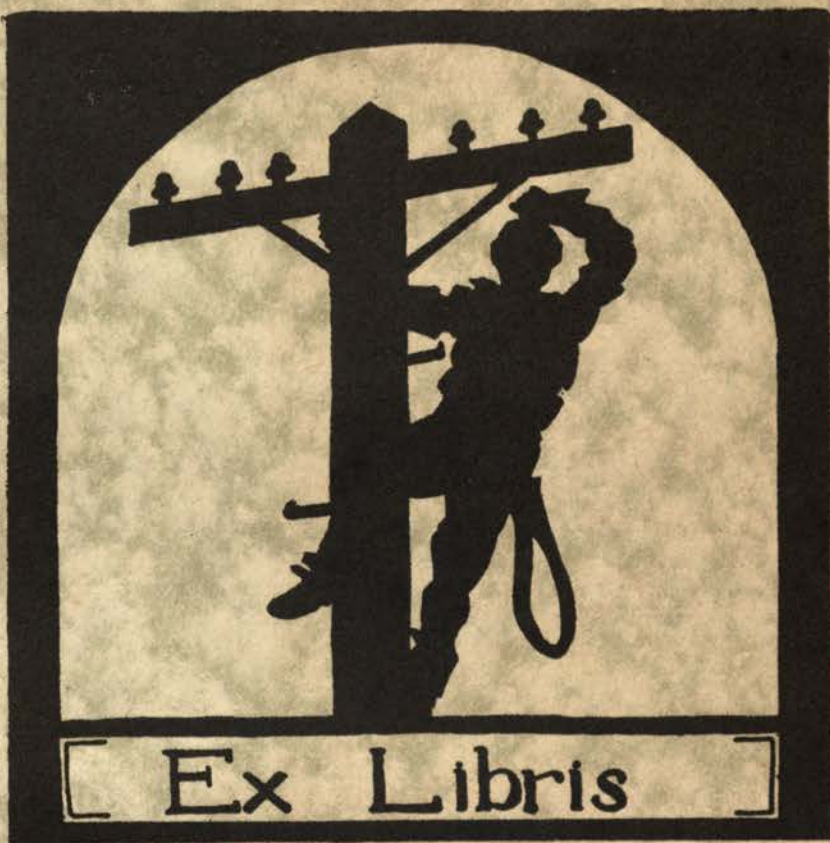
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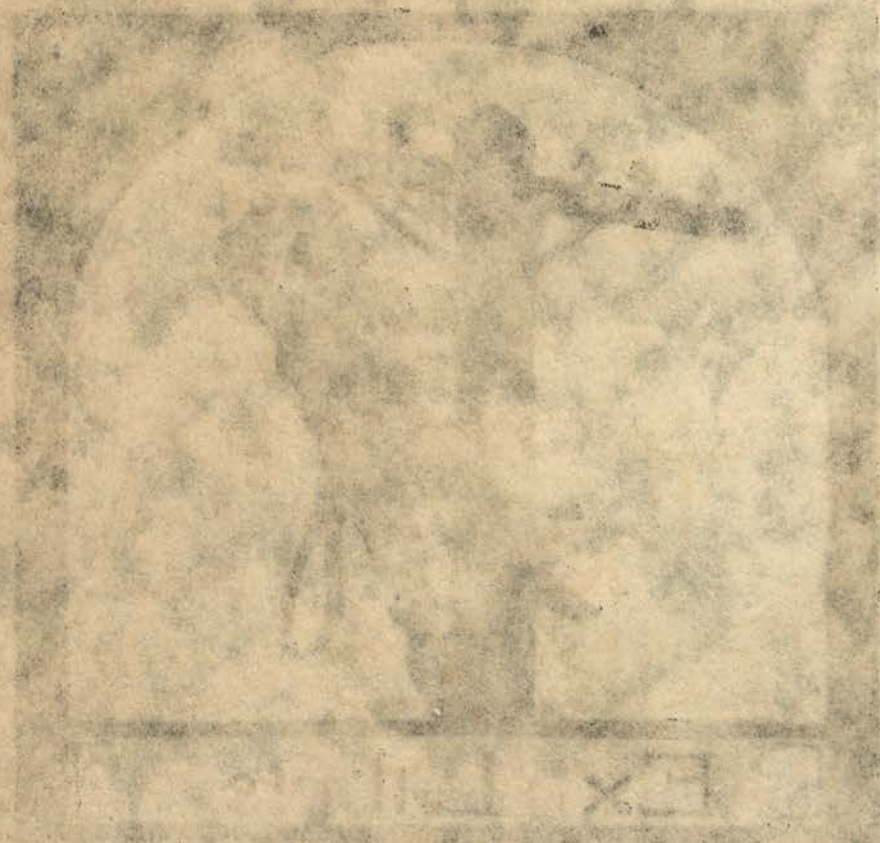
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The Rollamo of 1931





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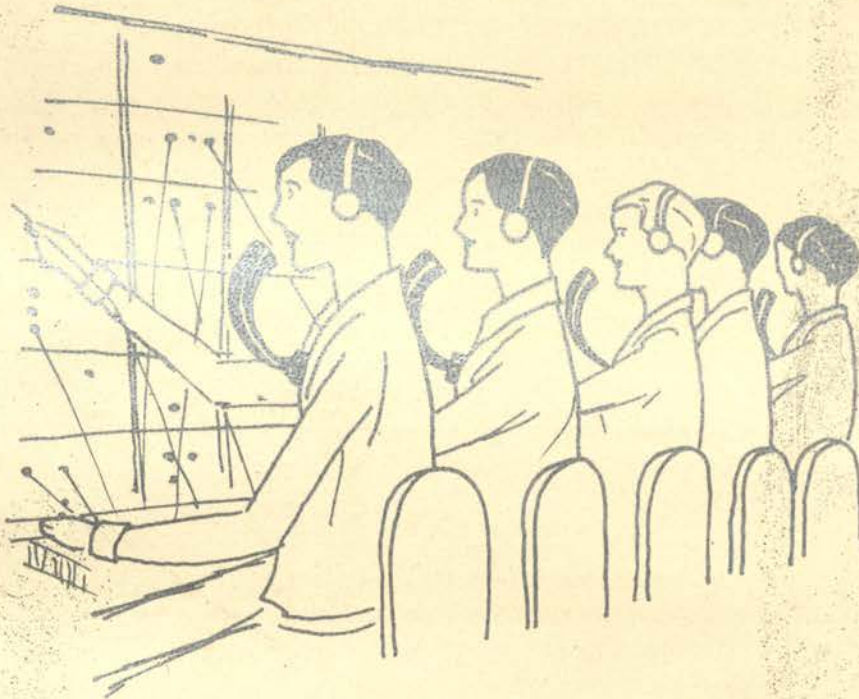
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The ROLLAMO



1931

**The Record of the year
of the
Missouri School of Mines and Metallurgy
Rolla ∴ Missouri**

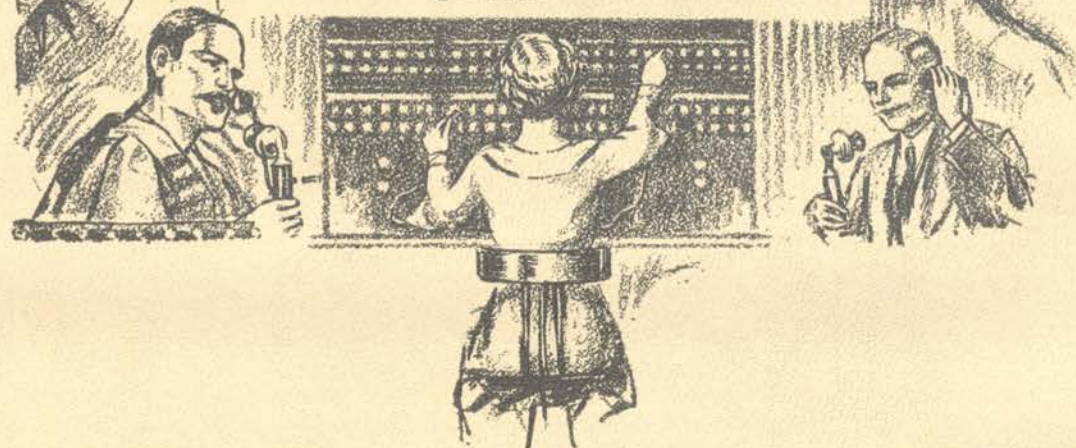


FOREWORD

Probably no other single invention has played the part in our modern civilization that the telephone has played. The telephone has made possible those rapid business methods that are characteristic of the modern world.

It is true that, at its earliest conception by Alexander Graham Bell, the telephone was considered by the world at large as a toy and impractical. It was rapidly improved, however, and in a very short time was firmly established. At present it is a practically indispensable part of our business and social world.

A complete discussion of its history and many applications would be quite beyond the scope of this work, but its salient features can be enumerated in this book as we depict the main phases in its development.





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DEDICATION

To an alumnus and professor of The Missouri School of Mines: to one who has worked with the interests of his students at heart, and who has engendered liking and respect in the hearts of those who know him: to one who has shown us the way to a broader view of life, and who has shown us the true engineering spirit: to GEORGE REINALD DEAN, we, the 1931 Rollamo Board, dedicate this book.



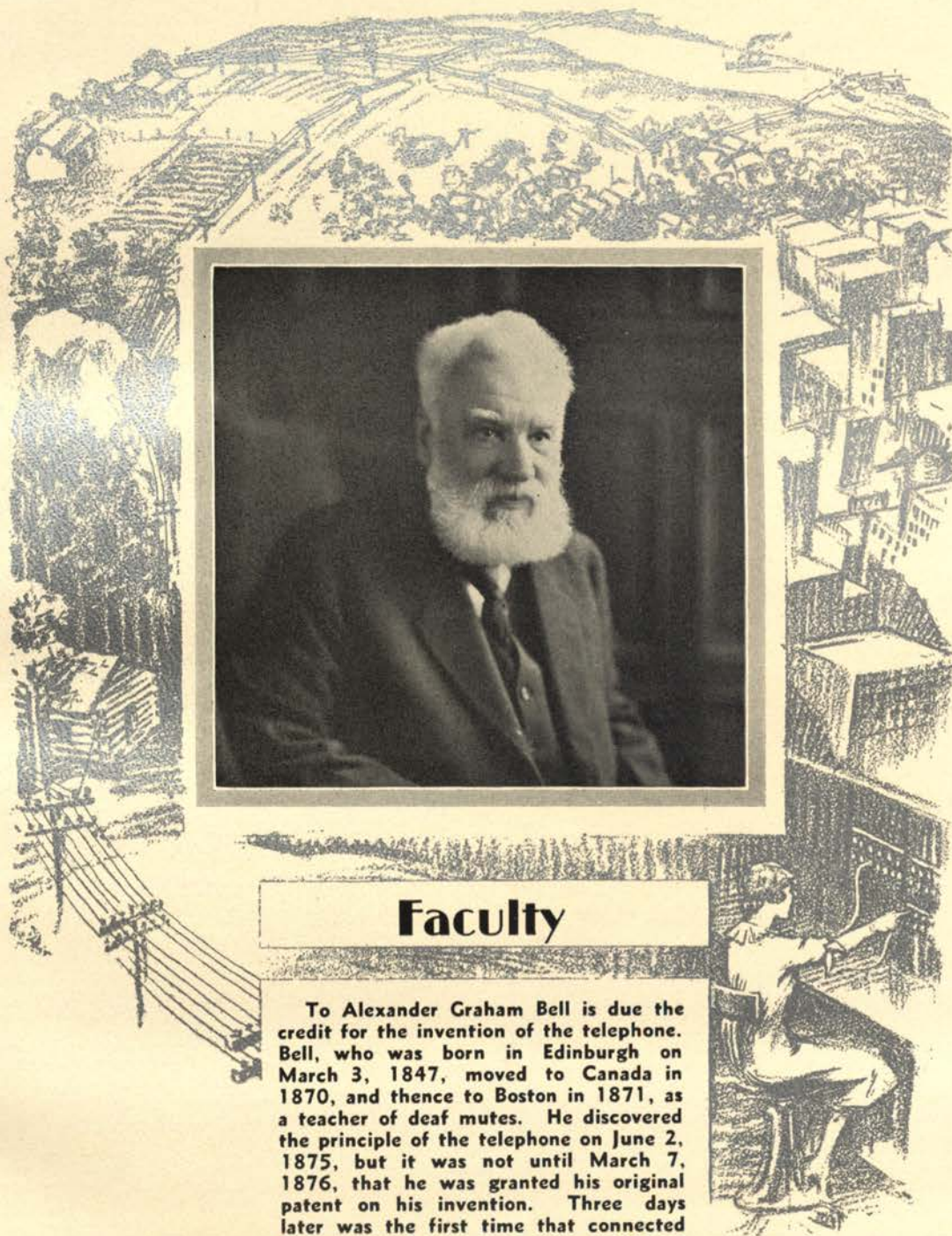
George Reinald Dean

In Memoriam

Gustavus A. Duncan
Class of 1874
Died December 10, 1930

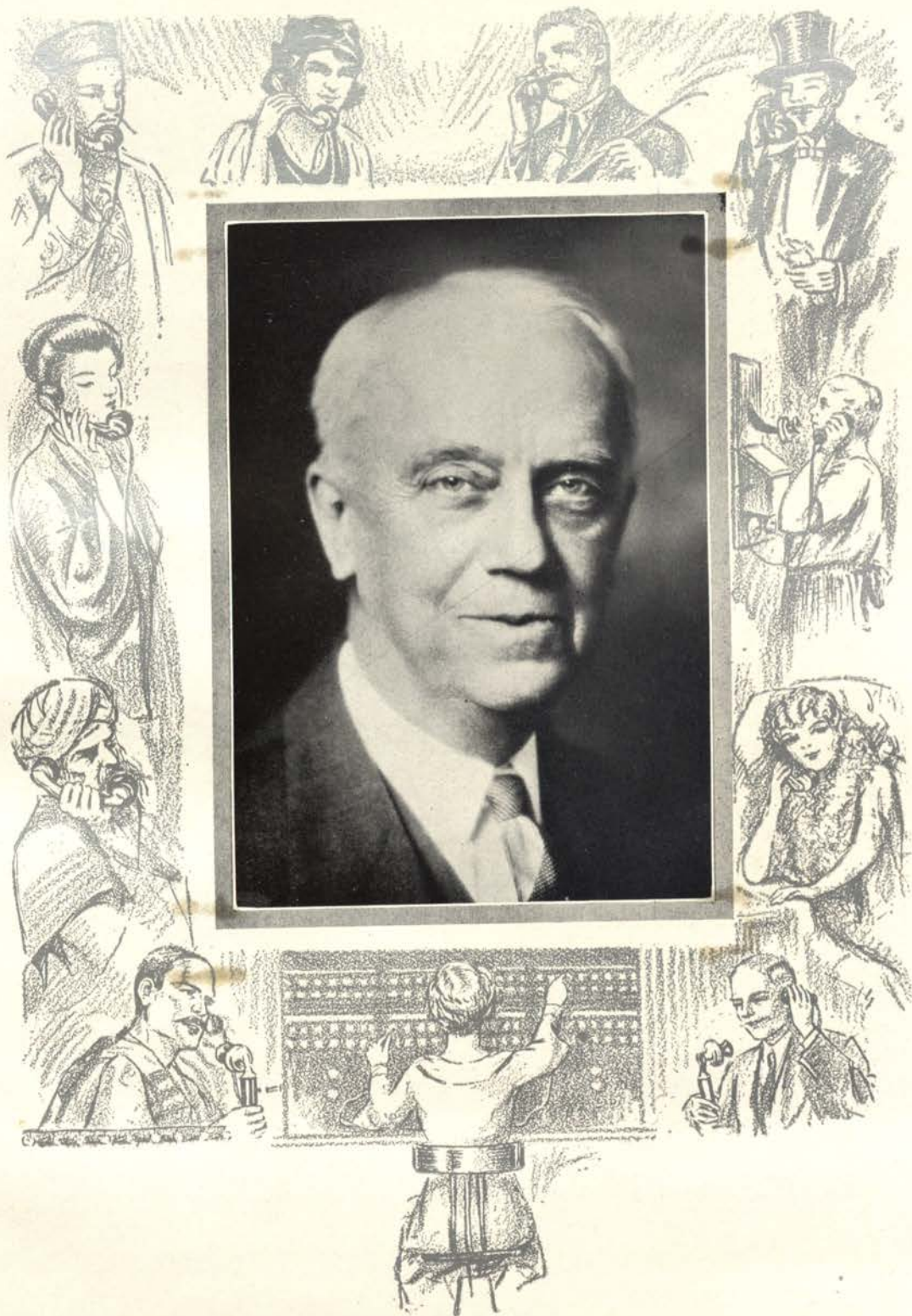


GUSTAVUS A. DUNCAN

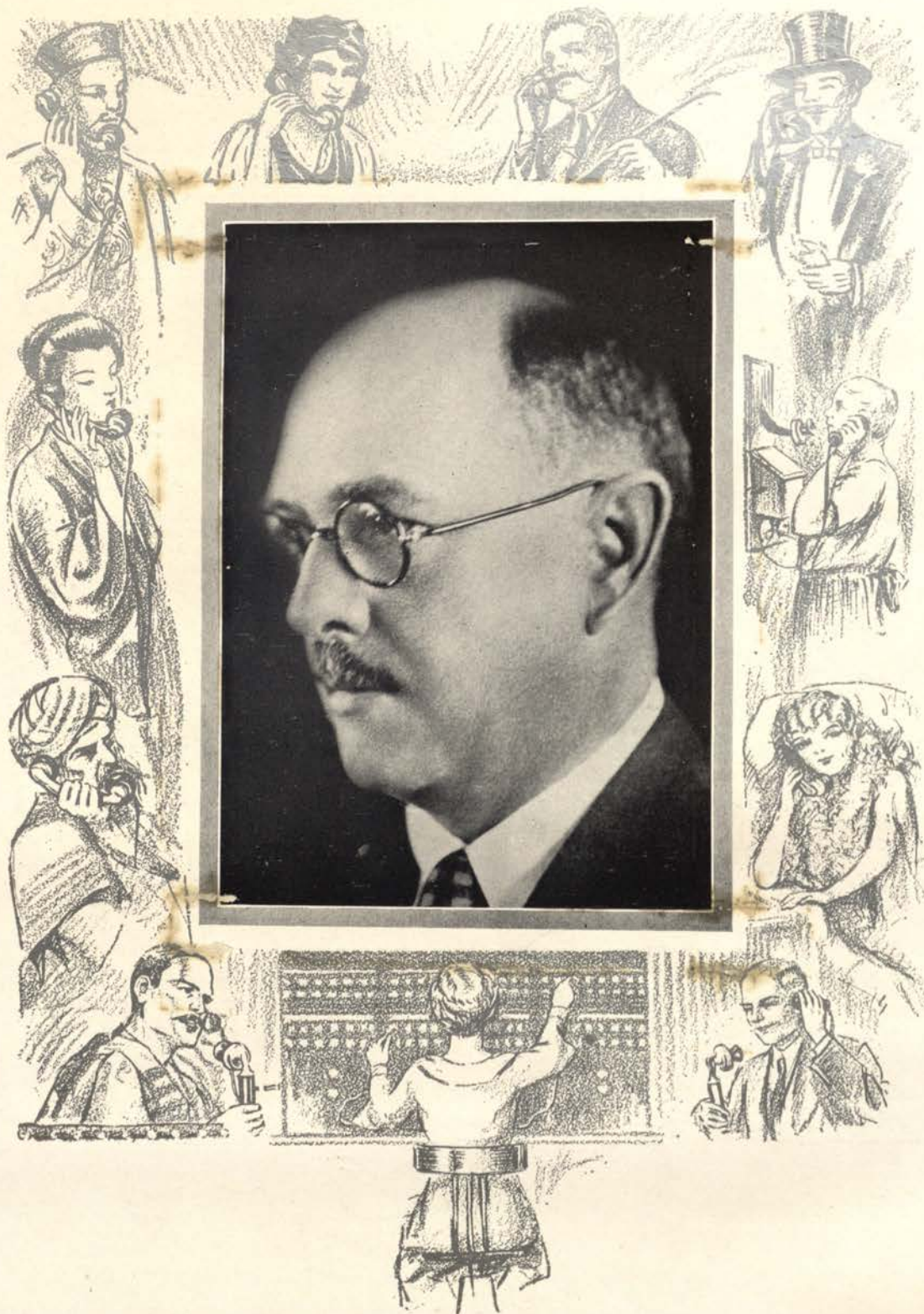


Faculty

To Alexander Graham Bell is due the credit for the invention of the telephone. Bell, who was born in Edinburgh on March 3, 1847, moved to Canada in 1870, and thence to Boston in 1871, as a teacher of deaf mutes. He discovered the principle of the telephone on June 2, 1875, but it was not until March 7, 1876, that he was granted his original patent on his invention. Three days later was the first time that connected human speech was ever transmitted and heard over a wire.



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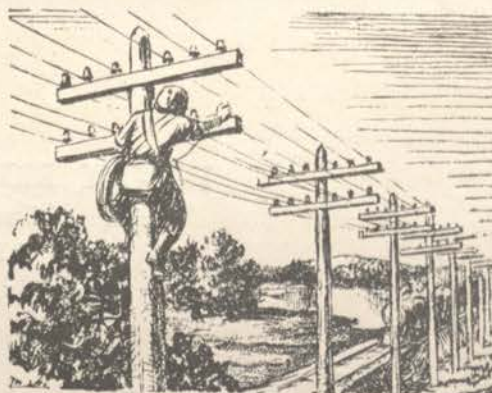
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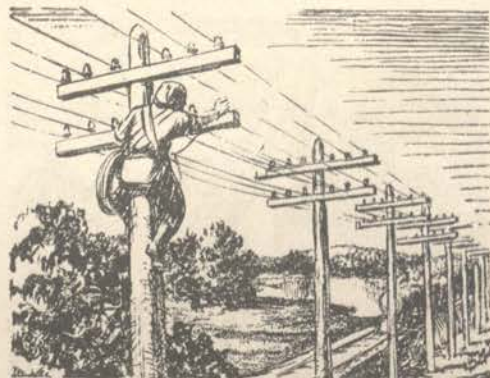
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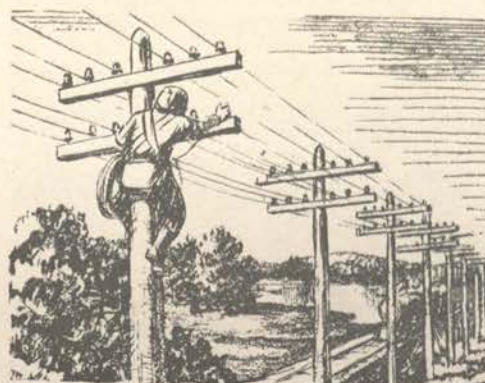
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An Ode to Dean

Be kind to your Sophomores, O George Reinald Dean,
Their beans are now sluggish and cold;
The works of each differentiating machine
Are rusty and sure growing old.

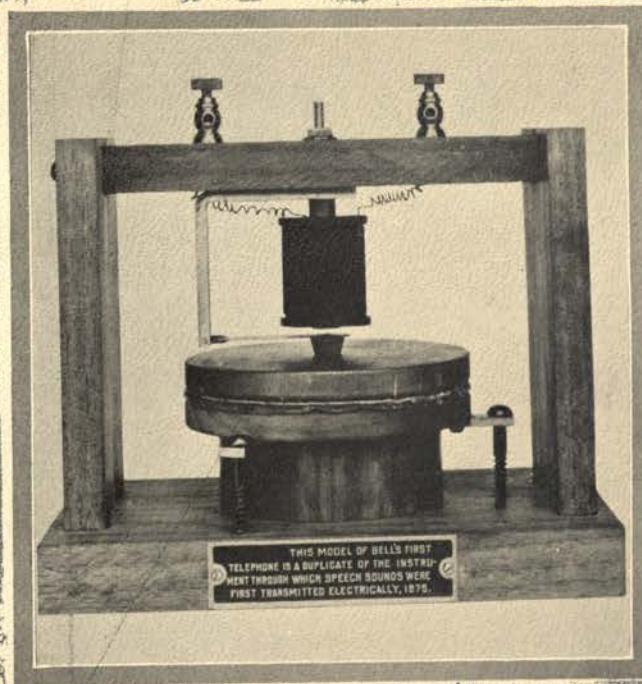
Ah, once they could do forty problems with ease,
But now they are spavined and lame;
Your quizzes alone give them heart disease,
Each mourns for the lack of a brain.

You toiled and you slaved like a government mule,
You gave every one a good chance,
You spoon-fed them full according to rule,
And rejoiced over each step's advance.

The campus is moist with the billows of sweat
You cheerfully shed as you sought,
To bring up these boobs to the mark you had set,
But the mark on their papers is "nought."

They say they don't know and don't give a damn
For the apples of knowledge that hang
Within easy reach of the bone-head called man,
But their hopes will go up with a bang.

So be kind to your Sophomores, friend George Reinald Dean
They'll be sorry they laughed when you railed,
The flush on their cheeks will turn sickly green
At the end of the term when they've failed.

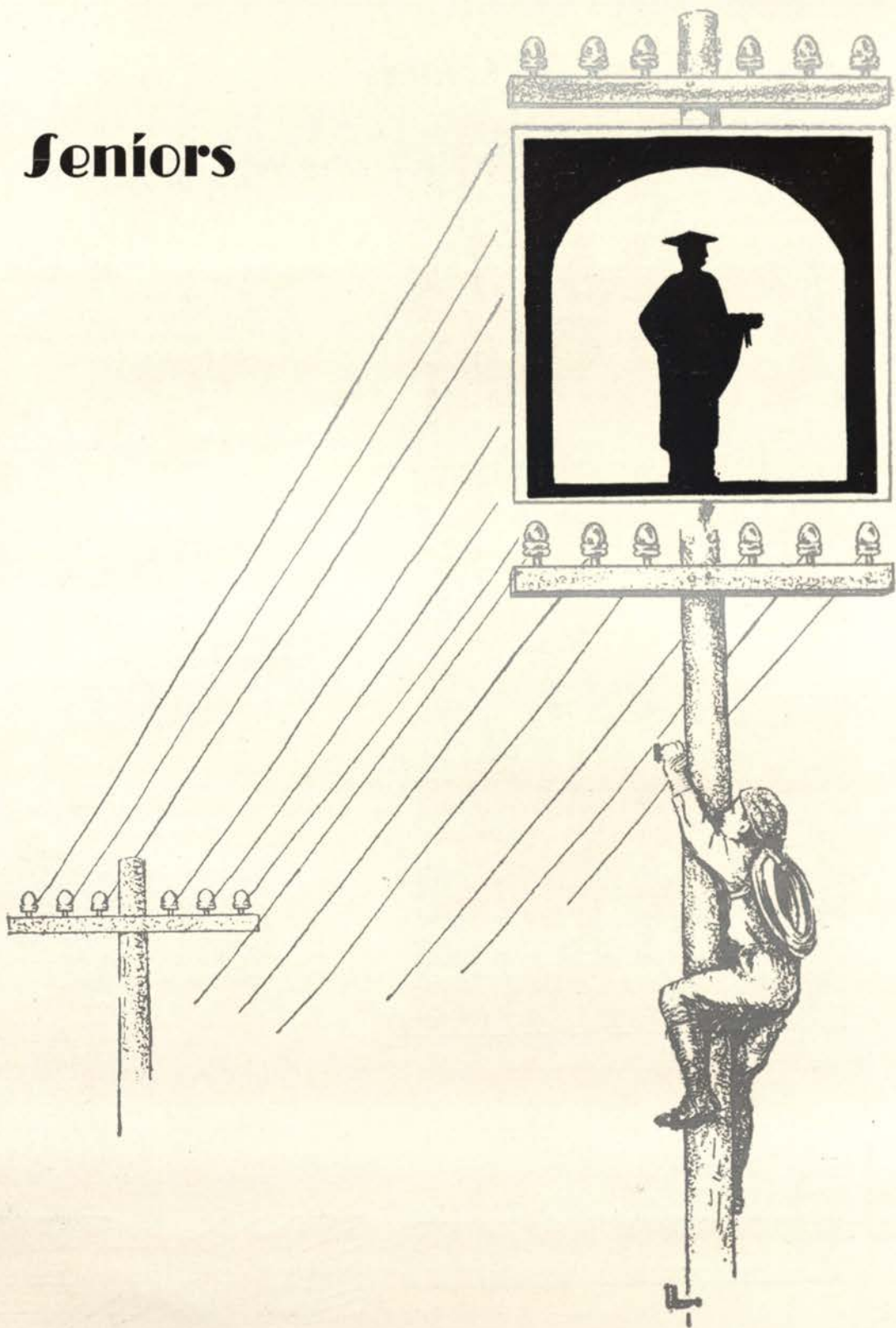


Classes

This instrument was the original telephone invented by Bell in 1875; in the first practical demonstration, however, in 1876, a slightly modified instrument was used. In the summer of 1876 Bell exhibited his modified instrument at the Centennial Exposition in Philadelphia. Here, however, it attracted no attention until it was acclaimed as a wonderful scientific achievement by some visiting scientists.



Seniors



Seniors



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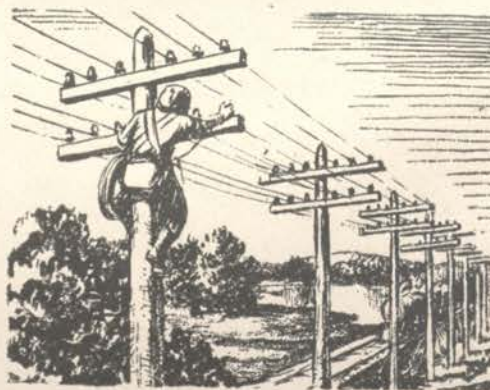
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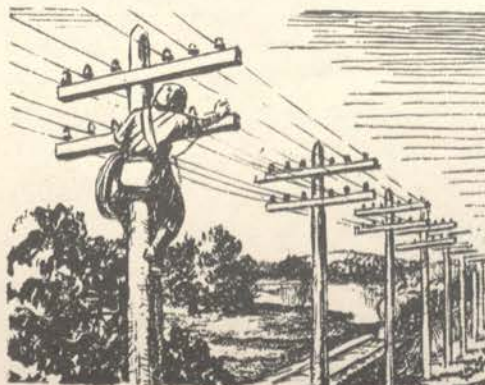
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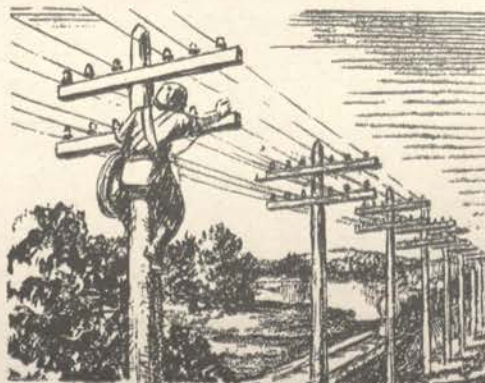
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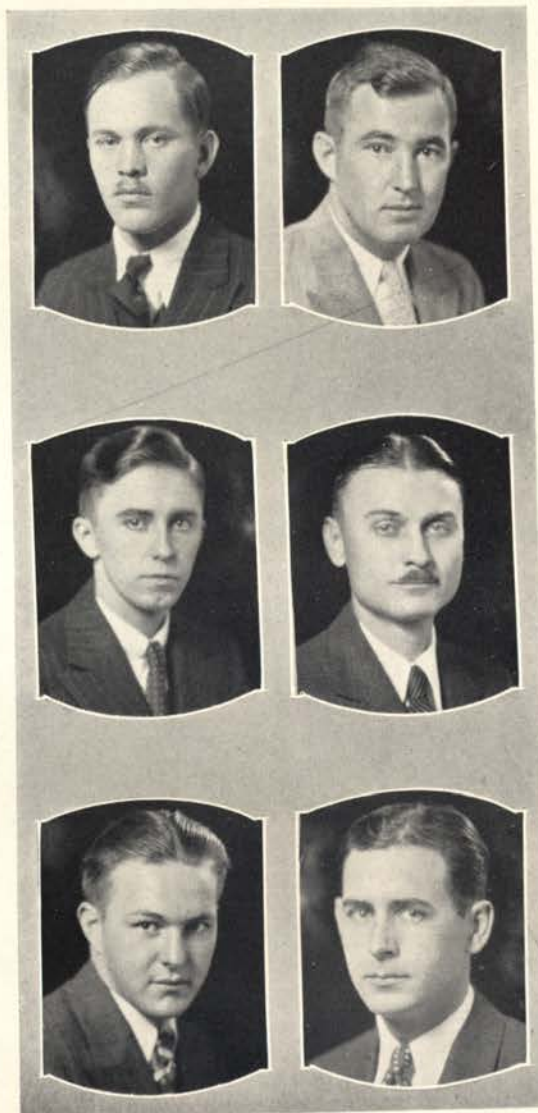
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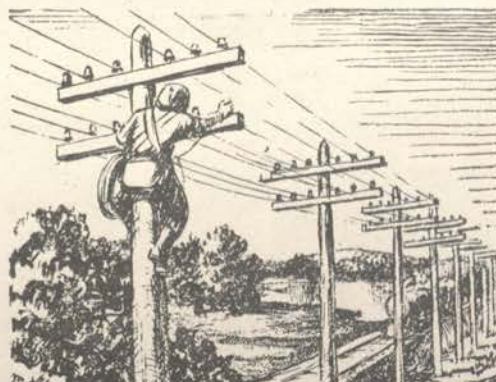
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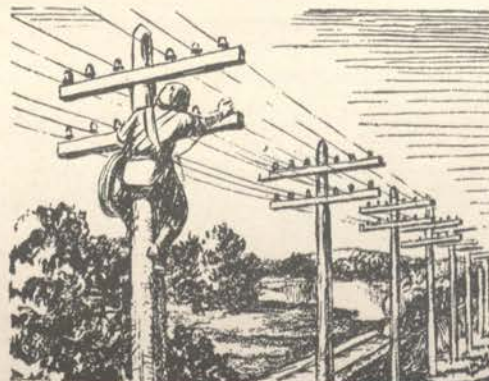
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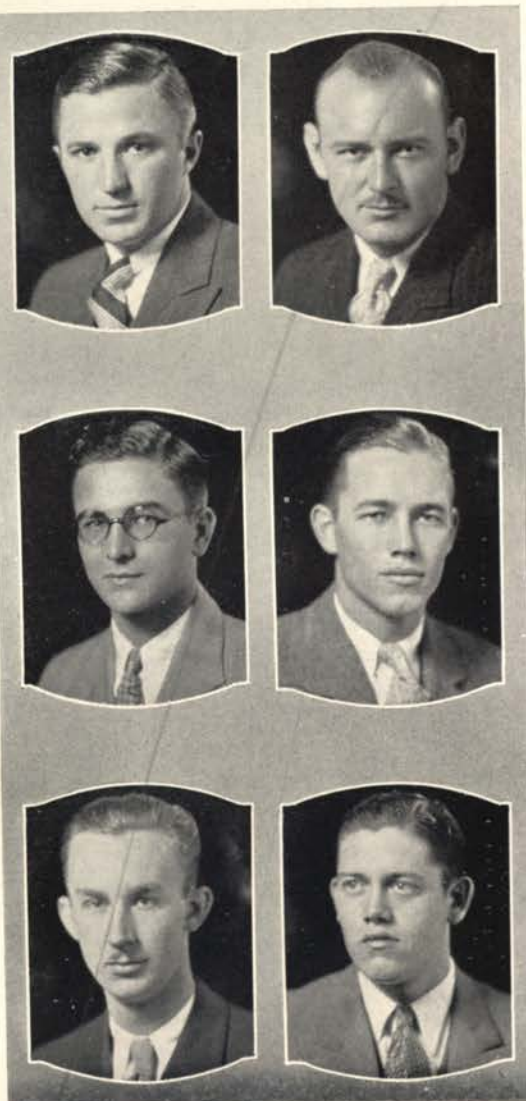
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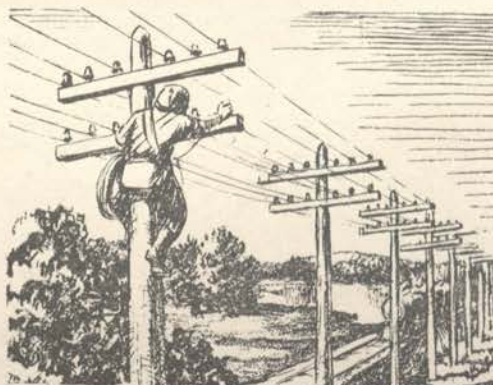
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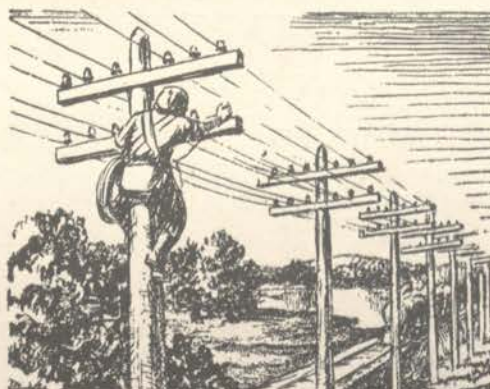
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Vice-President Class '30, B. S. in C. E., '30
Mechanical Engineering

CLIFFORD F. PAGE Harrisburg, Neb.
Prospector, Quo Vadis
Mining Engineering

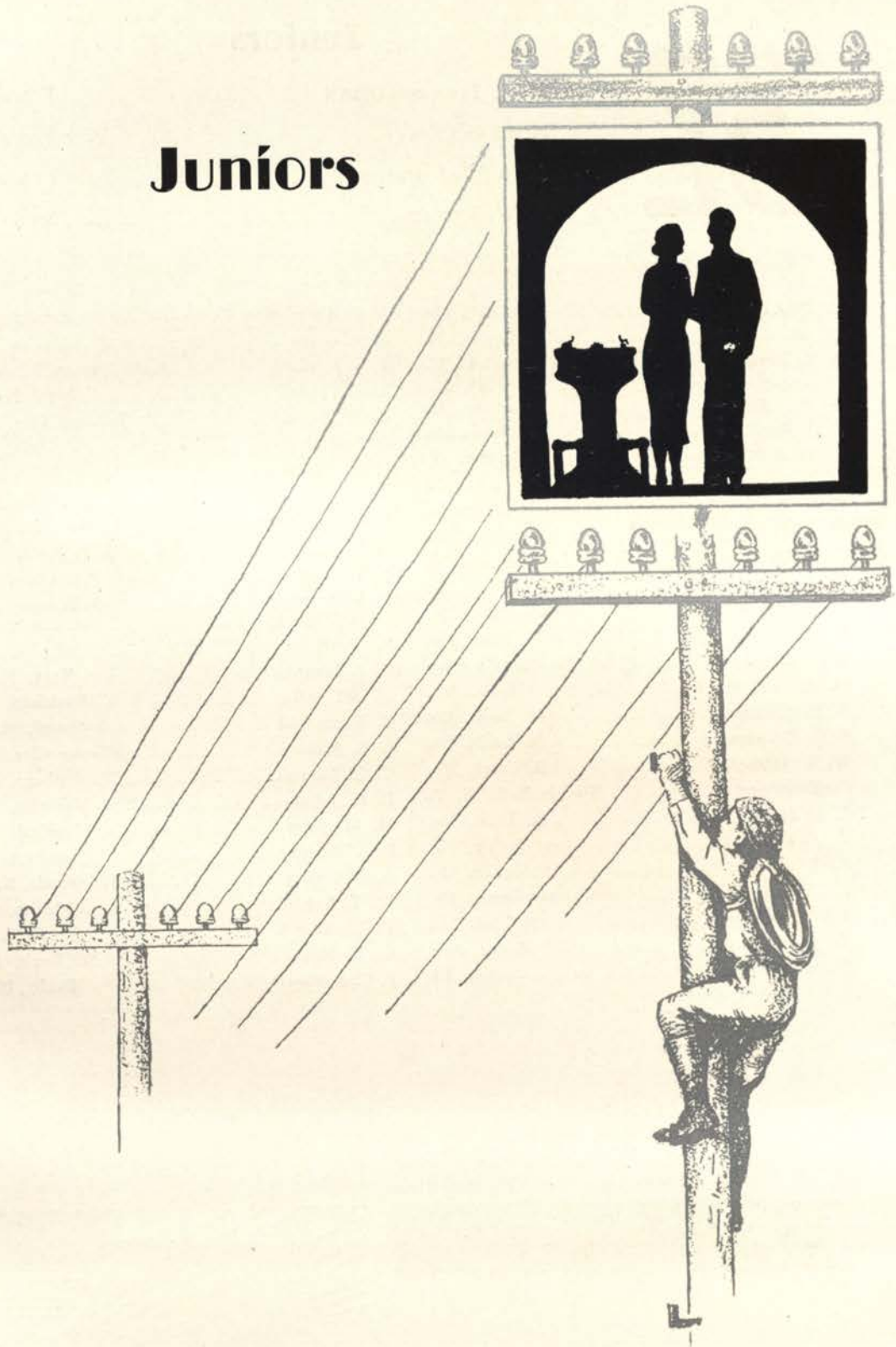
WILLIAM T. SHARP Henryetta, Okla.
Lambda Chi Alpha, Theta Tau, Satyr
Mining Engineering

MAURICE E. SUHRE Granite City, Ill.
Prospector, A. S. C. E., Satyr
Civil Engineering

H. L. WOLFE Billmore, N. Y.
Independent
Mechanical Engineering



Juniors

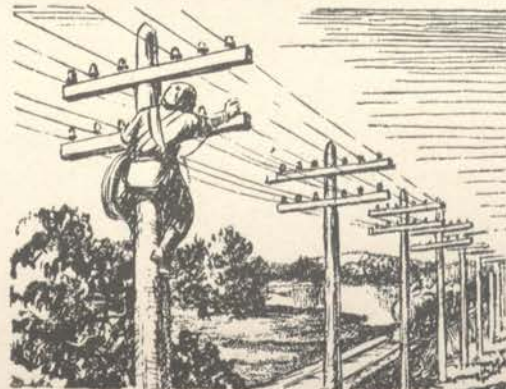


'32

Juniors

F. M. THOROUGHMAN	President
H. C. GIBBONS	Vice-President
A. J. WILLIAMS	Treasurer
A. W. KASSAY	Secretary

C. E. Achuff	St. Louis, Mo.	J. E. Gottsberger	Rolla, Mo.
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A. R. Bennett	Springfield, Ill.	J. M. Grellos	Rock Springs, Wyoming
J. C. Berkenbosch	Rolla, Mo.	F. D. Hale	Islys, N. Y.
R. A. Bertram	Belleville, Ill.	A. W. Happy	Jefferson City, Mo.
F. G. Biggs	St. Louis, Mo.	G. L. Harris	Joplin, Mo.
E. D. Bent	Decatur, Ill.	H. G. Hedges	Rolla, Mo.
M. P. Breuer	St. James, Mo.	A. M. Hess	Rolla, Mo.
F. W. Brooks	Cimarron, N. Mexico	J. B. Hinchman	St. Louis, Mo.
H. J. Bruegging	Jefferson City, Mo.	C. N. Hinton	Little Rock, Ark.
T. E. Caldwell	Los Angeles, Cal.	R. F. Hippler	St. Louis, Mo.
Fulton Campbell	Kansas City, Mo.	A. J. Hoeman	Washington, Mo.
R. L. Campbell	Kansas City, Mo.	E. D. Hoertel	St. Louis, Mo.
R. M. Carpenter	St. James, Mo.	R. T. Horn	Rushville, Mo.
J. A. Cartedge	Steubenville, Ohio	O. P. Hunt	Troy, N. Y.
H. L. Chamberlain	Rolla, Mo.	M. W. Ihike	Rockford, Ill.
B. H. Clemmons	St. Louis, Mo.	A. Jenczewski	Sherril, N. Y.
E. C. Crawford	St. Louis, Mo.	E. R. Jenkins	Jefferson City, Mo.
W. E. Darnell	Bismarck, Mo.	C. L. Johnson	Warrensburg, Mo.
O. Davenport	Tuxedo Park, N. Y.	L. K. Johnson	Maysville, Mo.
S. L. Davis	St. Louis, Mo.	M. M. Jones	Hannibal, Mo.
C. A. Elsea	Sweet Springs, Mo.	E. L. Karaker	Jonesboro, Ill.
K. E. Evans	Mexico, Mo.	A. W. Kassay	Tonawanda, N. Y.
E. H. Frauenfelder	Webster Groves, Mo.	W. T. Kay	Mexico, Mo.
I. W. Friedman	St. Louis, Mo.	V. L. Klesath	Rutland, Ill
W. A. Gallemore	Rogers, Ark.	G. L. Koch	St. Louis, Mo.
H. T. Gibbons	Canton, Ill.	F. C. Kohlmetz	Derby, N. J.





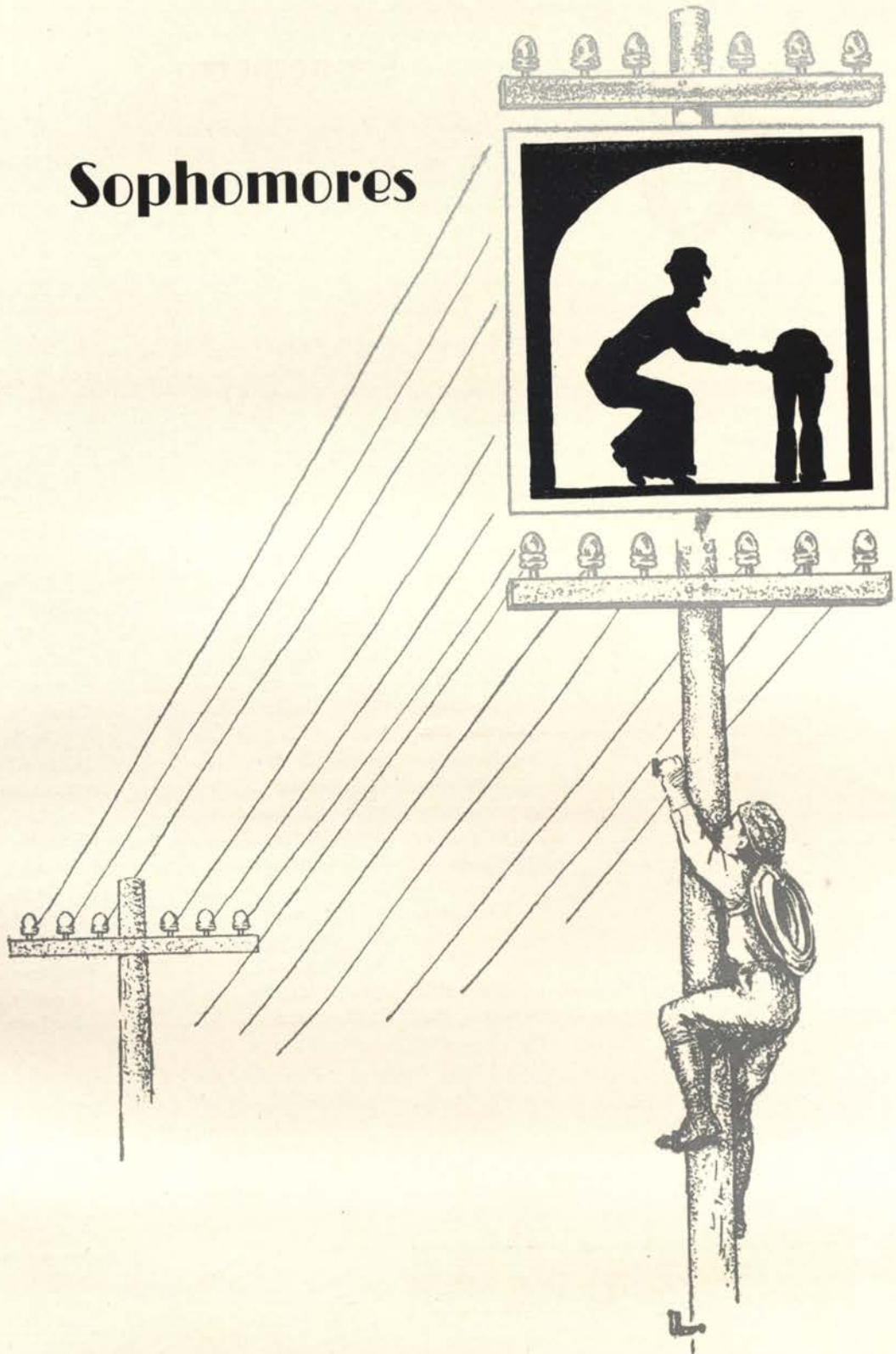
G. H. Krell.....	Naugatuck, Conn.	F. J. Malik.....	Elyria, Ohio
A. C. Kroll.....	Roanoke, Va.	John Matsek.....	Roselle, N. J.
F. M. Lang.....	St. Louis, Mo.	W. R. Mays.....	Henderson, Texas
R. L. Larkin.....	Clarkton, Mo.	H. W. Meyer.....	Richmond Heights, Mo.
O. K. Lay.....	St. Louis, Mo.	S. M. Malloy.....	Joplin, Mo.
G. L. Leisher.....	St. Louis, Mo.	Rex Monroe.....	Edwardsville, Ill.
R. H. Lunduis.....	St. Louis, Mo.	J. I. Moore.....	Dexter, Mo.
Mark McBrian.....	Shawnee, Okla.	H. J. Moreland.....	St. James, Mo.
J. R. McCarron.....	St. Louis, Mo.	S. W. Morris.....	Greenville, Miss.
R. L. McCreight.....	Jefferson City, Mo.	W. R. Muther.....	Webster Groves, Mo.
J. F. McDonald.....	Springfield, Ill.	H. P. Oehler.....	Alton, Ill.
J. J. McGrath.....	St. Louis, Mo.	J. J. Offutt.....	Mexico, Mo.
A. S. Macke.....	Belleville, Ill.	G. M. Pace.....	St. Louis, Mo.
F. S. Macklin.....	Kansas City, Mo.	H. T. Pajerski.....	Schenectady, N. Y.



H. E. Perrey.....	Chamois, Mo.	Clifton Smith.....	Cougill, Mo.
A. L. Pessin.....	St. Louis, Mo.	J. E. Stevens.....	Weaubleau, Mo.
R. F. Pettitt.....	Albuquerque, New Mexico	J. T. Sturm.....	St. Louis, Mo.
S. R. Pfromm.....	Cleveland, Ohio	S. E. Taylor.....	Rolla, Mo.
O. R. Pickett.....	Hannibal, Mo.	H. F. Thompson.....	Rolla, Mo.
J. A. Pollak.....	St. Louis, Mo.	F. M. Thoroughman.....	St. Louis, Mo.
R. V. Prevaillet.....	Perryville, Mo.	H. O. Tittle.....	Evansville, Ill.
J. S. Putnam.....	East St. Louis, Ill.	E. M. Tomlinson.....	Springfield, Ill.
R. P. Rhoades.....	Wheaton, Mo.	E. J. Towner.....	Carlville, N. Y.
F. E. Richardson.....	Cape Girardeau, Mo.	R. J. Victor.....	Kansas City, Mo.
W. R. Riggs.....	Cape Girardeau, Mo.	W. C. Walther.....	Halleck, Texas
R. J. Roesser.....	Buffalo, N. Y.	J. O. Warner.....	St. Louis, Mo.
C. K. Rose.....	Moneta, Cal.	R. H. Watters.....	Cleveland, Ohio
J. L. Rowan.....	Rolla, Mo.	C. H. Webb.....	Oak Grove, Mo.
R. H. Runder.....	St. Louis, Mo.	R. H. Wiethop.....	St. Louis, Mo.
Richard Rydstrom.....	St. Louis, Mo.	A. J. Williams.....	Granite City, Ill.
F. J. Schmutt.....	Eldora, Iowa	F. G. Wilson.....	Islip, N. Y.
C. J. Schultz.....	Cleveland, Ohio	W. O. Woods.....	Stillwater, Okla.
A. S. Schwartz.....	Webster Groves, Mo.	H. B. Wyrick.....	Waynesville, Mo.
A. V. Smith.....	St. Louis, Mo.	F. J. Zvanut.....	St. Louis, Mo.



Sophomores

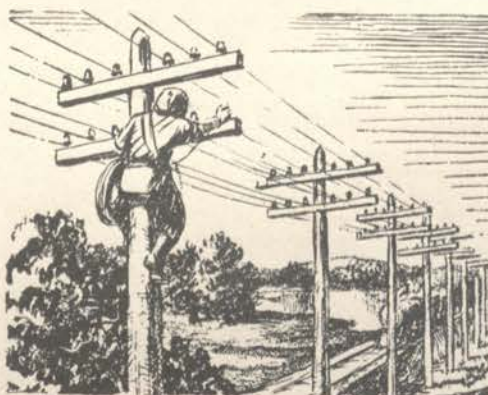


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Sophomores

W. M. GILMORE.....	<i>President</i>
W. L. BERRY.....	<i>Vice-President</i>
J. MESSERSMITH.....	<i>Treasurer</i>
J. H. MCKINLEY.....	<i>Secretary</i>

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V. L. Asher.....	Rolla, Mo.	V. I. Dodson.....	Greene, N. Y.
W. J. Barr.....	Jasper, Mo.	Thorpe Dresser.....	St. Francis, Mo.
C. H. Beardsley.....	Kankakee, Ill.	M. R. Edgar.....	Rolla, Mo.
A. W. Beinlich.....	St. Louis, Mo.	J. O. Farmer.....	Willard, Mo.
J. J. Beinlich.....	St. Louis, Mo.	Harry Federow.....	St. Louis, Mo.
W. L. Berry.....	Cape Girardeau, Mo.	C. P. Ferbrache.....	Springfield, Mo.
Hymen Bierman.....	Rolla, Mo.	J. O. Ferrell.....	Mountain Grove, Mo.
R. W. Borchers.....	Sedalia, Mo.	Choy Fong.....	Canton, China
R. L. Braentigam.....	Belleville, Ill.	F. Fraulini.....	Bevier, Mo.
J. T. Bratton.....	St. Louis, Mo.	W. F. Gaddis.....	Joplin, Mo.
W. O. Brewster.....	Pine Bluff, Ark.	O. C. Garst.....	Rolla, Mo.
W. H. Brown.....	Alton, Ill.	M. W. Gerken.....	Lincoln, Mo.
W. A. Brown.....	Rolla, Mo.	D. T. Gibson.....	Denver, Colo.
J. B. Campbell.....	Arcadia, Kans.	E. W. Greske.....	Concordia, Mo.
G. A. Cavis.....	Crystal, Mo.	D. H. Gillis.....	Joplin, Mo.
M. F. Cichowski.....	Batavia, N. Y.	W. M. Gilmore.....	Jacksonville, Ill.
R. A. Clark.....	Joplin, Mo.	B. C. Goedde.....	East St. Louis, Ill.
F. A. Click.....	Springfield, Mo.	F. D. Gottsberger.....	St. Louis, Mo.
W. Coghill.....	Rolla, Mo.	S. W. Grace.....	Chillicothe, Mo.
R. M. Covell.....	Kenmore, N. Y.	R. S. Green.....	Mexico, Mo.
K. D. Cox.....	Rolla, Mo.	L. V. Grimm.....	Rolla, Mo.
J. H. Crawford.....	West Plains, Mo.	A. S. Groves.....	St. Louis, Mo.
F. A. Crippen.....	Webster Groves, Mo.	J. C. Hall.....	St. James, Mo.
David Cutler.....	Woodbine, N. J.	W. T. Hanback.....	Washington, Mo.
F. R. Davidson.....	Cairo, Ill.	M. G. Handley.....	Aullville, Mo.
H. W. Decker.....	St. Louis, Mo.	J. Handshear.....	St. Louis, Mo.

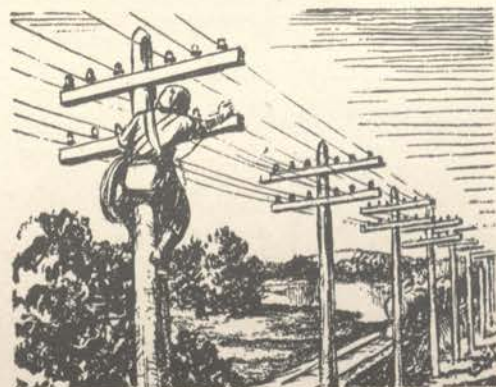




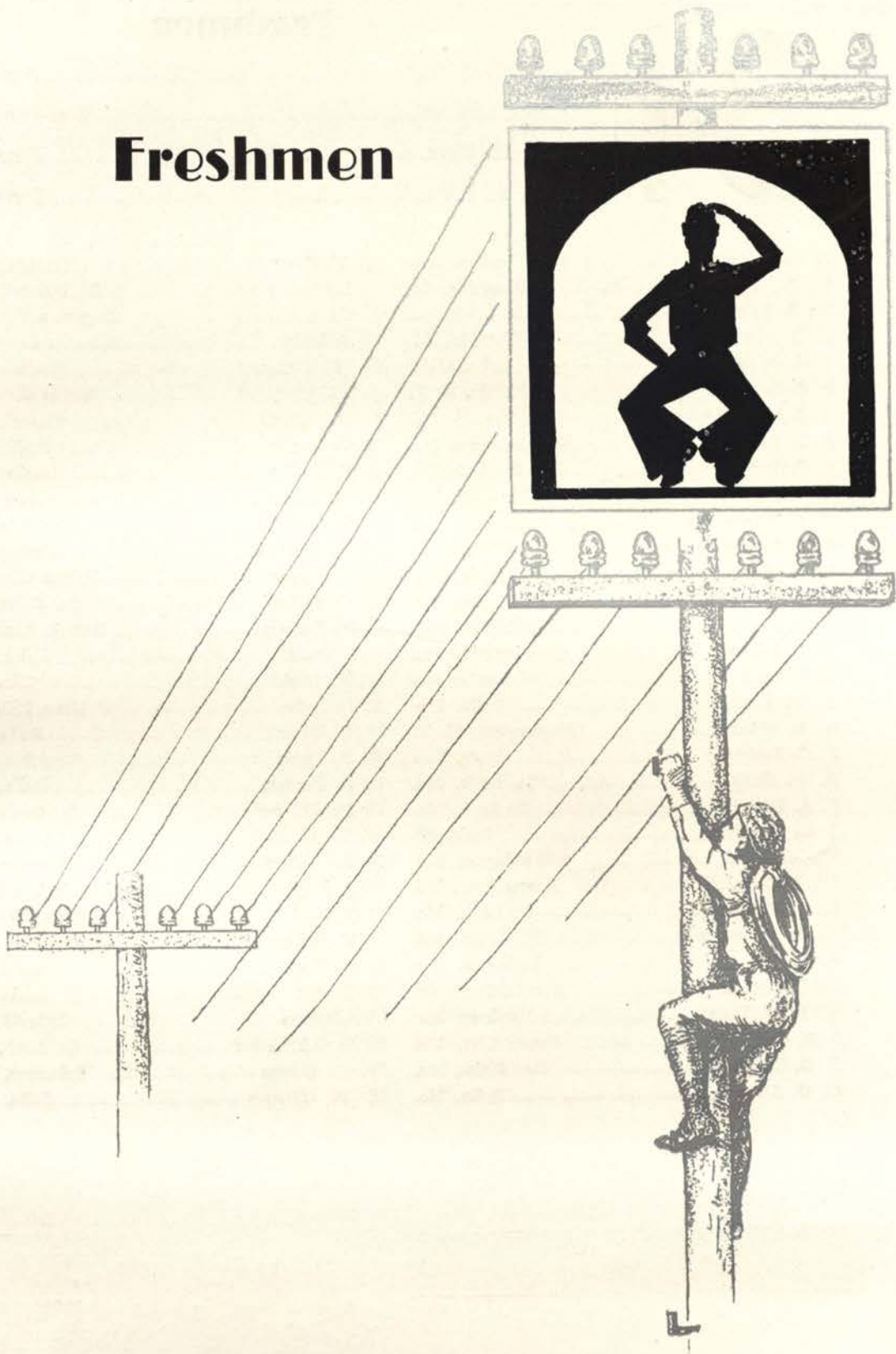
J. J. Harmon	St. Louis, Mo.	H. W. Ill	Rock Island, Ill.
G. Heligman	St. Louis, Mo.	W. J. Jabsen	New Berlin, Ill.
J. H. Hell	Rolla, Mo.	C. M. Jenkins	Kansas City, Mo.
Helmkamp	Moro, Ill.	M. L. Johnson	Rolla, Mo.
M. L. Herzog	St. Louis, Mo.	A. J. Jones	Jamestown, N. Y.
A. H. Hesse	Webster Groves, Mo.	W. E. Kountz	St. Louis, Mo.
L. A. Hibbets	Desloge, Mo.	H. W. Krattly	St. Louis, Mo.
H. S. Hickman	Shelbyville, Mo.	K. R. Krummenacher	Clayton, Mo.
E. C. Hoff	Grandview, Mo.	C. H. Lambur	St. Louis, Mo.
C. R. Hubbard	Kansas City, Mo.	C. W. Lamers	St. Louis, Mo.
J. H. Hultz	Rolla, Mo.	R. H. Latham	California, Mo.
T. W. Hunt	Babylon, N. J.		



W. H. Lenz	Concordia, Mo.	H. E. Rudent.....	Cape Girardeau, Mo.
R. R. Levy.....	St. Louis, Mo.	W. H. Russler.....	Busnell, Ill.
Sidney Levy.....	St. Louis, Mo.	C. H. Schmitz.....	Rolla, Mo.
E. W. Lindblad.....	Gerry, N. Y.	G. M. Schwartz.....	St. Louis, Mo.
J. M. Londe.....	St. Louis, Mo.	T. O. Seiberling.....	West Plains, Mo.
E. W. Londrigan.....	Springfield, Ill.	H. W. Short.....	Springfield, Mo.
F. J. Louney.....	Vandalia, Mo.	A. E. Shrubsall.....	Niagara Falls, N. Y.
E. W. McClure.....	Weatherby, Mo.	R. W. Simpson.....	Falls City, Neb.
J. H. McKinley.....	Rolla, Mo.	J. R. Skiver.....	St. Louis, Mo.
C. R. Maise.....	St. Louis, Mo.	J. T. M. Smith.....	Kansas City, Mo.
J. D. Martin.....	St. Louis, Mo.	L. C. Spiers.....	St. Joseph, Mo.
E. R. Mertz.....	St. Louis, Mo.	I. C. Spotti.....	Staunton, Ill.
Messersmith.....	Tuscumbia, Mo.	A. P. Staver.....	Kansas City, Mo.
B. K. Miller.....	Mexico, Mo.	K. J. Stedelin.....	Licking, Mo.
K. G. Montgomery.....	Rolla, Mo.	Perry Steen.....	Springfield, Mo.
G. H. Musson.....	Kansas City, Mo.	C. R. Strang.....	Osgood, Ind.
F. S. Mazic.....	Gloversville, N. Y.	J. L. Swalley.....	Baxter Springs, Kans.
R. A. Parker.....	Eureka, Mo.	Eli Tatalovich.....	Rolla, Mo.
G. A. Paul.....	Hammond, Ind.	H. E. Thilenius.....	Cape Girardeau, Mo.
J. J. Picco.....	Terrace, Mo.	H. R. Thornton.....	Chicago, Ill.
W. M. Pickles.....	El Paso, Texas	A. P. Towell.....	St. James, Mo.
R. E. Pinkley.....	Carthage, Mo.	J. M. Uceda.....	Peru, South America
A. A. Pollack.....	St. Louis, Mo.	B. W. Walton.....	Columbus, Georgia
D. M. Potter.....	Thayer, Kans.	G. M. Warren.....	Kansas City, Mo.
P. B. Prough.....	Kirkwood, Mo.	L. F. Wildberger.....	St. Louis, Mo.
R. W. Richmond.....	Ste. Genevieve, Mo.	J. M. Willhite.....	St. Louis, Mo.
C. C. Rodd.....	Marion, Ill.	F. F. Williams.....	Campbell, Mo.
C. R. Rosenbaum.....	Kansas City, Mo.	E. F. Woodman.....	Rolla, Mo.
W. M. Rodgers.....	St. Louis, Mo.	E. T. Wortman.....	Levy, Ark.
L. S. Rolufs.....	Arlington, Mo.	Jack Yarber.....	Poplar Bluff, Mo.
T. W. Royer.....	St. Louis, Mo.	Michael Young.....	Chihuahua, Mexico
E. C. Rubio.....	Morelia Mich., Mexico		



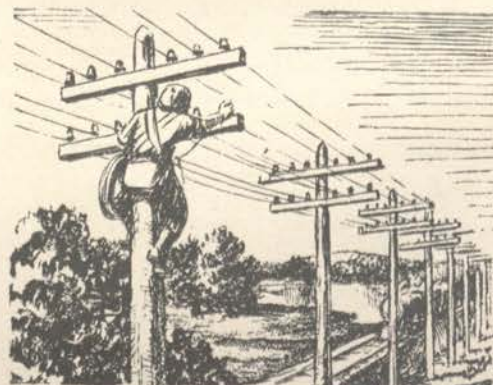
Freshmen



Freshmen

H. H. HAHN	<i>President</i>
D. P. HALE	<i>Vice-President</i>
J. H. ZELL	<i>Treasurer</i>
G. A. HALE	<i>Secretary</i>

P. A. Abbett	Brechlinridge, Mo.	W. H. Crow	St. Louis, Mo.
H. R. Absher	Okanville, Ill.	R. L. Cummins	Webster Groves, Mo.
W. R. Achuff	St. Louis, Mo.	J. Czyzewski	Englishtown, N. J.
F. B. Allen	Pittsfield, Ill.	A. E. Daily	St. Louis, Mo.
J. D. Anderson	Tulsa, Okla.	D. W. Darby	Buffa'o, Mo.
P. A. Badame	Buffalo, N. Y.	J. S. Darling	Kansas City, Mo.
G. S. L. Bartholomaeus	Jefferson City, Mo.	L. O. Darnell	Bismark, Mo.
E. P. Baumann	Ste. Genevieve, Mo.	Clyde Denton	Pacific, Mo.
G. F. Bemberg	St. Louis, Mo.	L. S. DeWitt	Mexico, Mo.
W. Berry	Versailles, Mo.	W. P. Dixon	Canton, Ill.
C. E. Bloom	Maysville, Mo.	T. S. Donahue	Rolla, Mo.
H. F. Blount	Potosi, Mo.	H. H. Douthitt	Ritchey, Mo.
L. M. Bolon	Rolla, Mo.	O. B. Dreyer	Kansas City, Mo.
P. C. Branstetter	Mexico, Mo.	W. Duenckel	St. Louis, Mo.
R. D. Brasaemble	Barberton, Ohio	O. M. Duncan	East St. Louis, Ill.
J. L. Brazeal	Springfield, Mo.	J. E. Dunn	Urich, Mo.
C. J. Brock	Jacksonville, Mo.	R. N. Durbin	Cairo, Ill.
B. W. Brown	Rolla, Mo.	H. C. Earle	Oaklane, Phila, Ia.
M. L. Bubas	Binghamton, N. Y.	M. E. Edgar	Rolla, Mo.
H. C. Buchanan	Pratt, Kan.	D. E. Fagan	Donyshan, Mo.
R. H. Buck	St. Louis, Mo.	F. L. Faudree	Rolla, Mo.
E. A. Burnett	St. Louis, Mo.	G. H. Fletcher	St. Louis, Mo.
J. D. Burnham	Paris, Ill.	W. B. Fletcher	Ironton, Mo.
W. W. Busch	Washington, Mo.	F. L. Follett	Kewanee, Ill.
W. J. Campbell	Kansas City, Mo.	D. A. Ford	Robinson, Ill.
L. A. Cardosi	St. Louis, Mo.	G. T. Ford	Springfield, Mo.
G. R. Carpenter	St. James, Mo.	G. V. Forsgren	Fort Smith, Ark.
P. G. Cei	Lexington, Mo.	E. W. Fort	Rolla, Mo.
W. E. Christie	East St. Louis, Ill.	G. J. Fox	St. Louis, Mo.
W. N. Coffman	Newburg, Mo.	V. Friedman	Belleville, Ill.
J. B. Coil	Kansas City, Mo.	O. E. Geldmacher	St. Louis, Mo.
R. E. Crawford	West Plains, Mo.	W. C. George	Princeton, Ind.
G. O. Cross	Rolla, Mo.	H. P. Gillespie	Rolla, Mo.





C. A. Gladson.....	Pinckneyville, Ill.	J. B. Hilton.....	St. Louis, Mo.
F. Goodrich.....	Columbus, Neb.	H. A. Hoffman.....	Rolla, Mo.
R. J. Groom.....	Belleville, Ill.	R. R. Hoggard.....	Portageville, Mo.
E. C. Gruetaemacher.....	Kimmswick, Mo.	H. H. Hoyt.....	Hull, Ill.
E. T. Hackett.....	St. Louis, Mo.	R. A. Hubbard.....	East Chicago, Ind.
G. N. Hackman.....	St. Louis, Mo.	E. B. Huff.....	St. Louis, Mo.
H. B. Haddock.....	St. Louis, Mo.	E. A. Huffman.....	St. Louis, Mo.
H. H. Hahn.....	Kirkwood, Mo.	J. E. Hyland.....	Rolla, Mo.
F. N. Haines.....	Rivermines, Mo.	W. J. Irwin.....	St. Marys, Mo.
D. P. Hale.....	Atlanta, Ga.	W. L. Jones.....	Rolla, Mo.
G. A. Hale.....	St. Louis, Mo.	LeCompte Joslin.....	Rolla, Mo.
L. Hales.....	Elyria, Ill.	P. E. Kabrick.....	Clear Lake, Iowa
Dana Hansby.....	Rolla, Mo.	T. B. Kaezmarek.....	Chicago, Ill.
J. N. Haskins.....	Topeka, Kan.	B. C. Kauffman.....	St. Louis, Mo.
W. A. Hedges.....	Rolla, Mo.	J. P. Keighley.....	Carney's Point, N. J.
Henrickson.....	Poplar Bluff, Mo.	C. P. Keller.....	Poplar Bluff, Mo.



C. E. Kew	Kansas City, Mo.	F. R. Schleenvoight	Palisades Park, N. J.
F. H. Kister	St. Charles, Mo.	N. A. Schmidt	St. Louis, Mo.
F. W. Klee	Kansas City, Mo.	E. Schofield	Eagle Pass, Texas
N. J. Klingler	Kansas City, Mo.	G. C. Schroeder	Milwaukee, Wis.
E. C. Kozeny	St. Louis, Mo.	Charles Segal	St. Louis, Mo.
E. E. Kracht	St. Louis, Mo.	E. C. Shafer	Greenfield, Mo.
J. E. Lacey	Canton, Ill.	K. H. Sievers	Springfield, Mo.
M. F. Lagemann	St. Louis, Mo.	I. W. Skelton	Palisades Park, N. J.
F. A. Lane	Rolla, Mo.	P. E. Smelser	St. Charles, Mo.
E. R. Largent	Portageville, Mo.	W. F. Smith	Findley, Ohio
M. B. Larwood	Albion, N. Y.	Lon Stanton	Richland, Mo.
R. L. McCaughan	St. Louis, Mo.	C. B. Stolle	Evansville, Ill.
F. A. McConnell	St. Louis, Mo.	R. L. Stone	Norwalk, Ohio
P. C. McDonald	Macon, Mo.	L. J. Sullentrup	Washington, Mo.
W. L. McDonald	Urich, Mo.	R. E. Swift	Chicago, Ill.
J. P. McNutt	Morris, Okla.	J. D. Tanner	Poplar Bluff, Mo.
E. F. Maehl	St. Louis, Mo.	R. E. Taylor	St. Louis, Mo.
J. W. Magho	Clayton, Mo.	J. W. Thompson	Tulsa, Okla.
F. S. Mahler	Maplewood, Mo.	G. M. Thornberry	Rolla, Mo.
W. G. Maloney	Kansas City, Mo.	C. J. Thorpe	Jantha, Mo.
W. M. Manuel	Malden, Mass.	R. A. Tiemann	St. Louis, Mo.
C. S. Marxen	Belleville, Ill.	R. R. Townsend	Dongola, Ill.
M. F. Mathes	Belleville, Ill.	A. R. Towse	Macon, Mo.
J. C. Meacham	Barberton, Ohio	R. Trotter	Rolla, Mo.
O. J. Michener	Champaign, Mo.	J. B. Ulrey	Eldon, Mo.
E. J. Milly	Macon, Mo.	W. A. Unzicker	Pontiac, Ill.
C. J. Murphy	St. Louis, Mo.	Ramon Vining	Greenwood, Miss.
C. E. Musick	Ferguson, Mo.	J. F. Wagner	Sedalia, Mo.
H. L. Nicholson	University, Mo.	G. W. Walker	St. Louis, Mo.
O. L. Nuernberger	New Athens, Ill.	L. C. Walker	Hightstown, N. J.
C. H. Orf	Maplewood, Mo.	A. H. Walther	Halleck, Nevada
A. R. Oswald	St. Louis, Mo.	D. O. Watson	East St. Louis, Ill.
B. H. Penwarden	Buffalo, N. Y.	R. C. Weigel	Webster Groves, Mo.
A. F. Peterson	Sullivan, Mo.	P. L. Welch	Springfield, Mo.
L. E. Poe	St. Charles, Mo.	D. H. Wells	Indianapolis, Ind.
C. G. Powell	Rolla, Mo.	W. W. Westerfeld	St. Charles, Mo.
W. R. Power	Kirkwood, Mo.	P. D. Wild	Spickard, Mo.
R. E. Ranta	Waukegan Lake, Ill.	C. A. Williams	Argo, Ill.
R. A. Sackwitz	Kansas City, Mo.	A. N. Wilson	East Orange, N. J.
F. L. Sandoe	University, Mo.	E. H. Witter	St. Louis, Mo.
R. J. Scafe	Kansas City, Mo.	E. A. Wotawa	St. Louis, Mo.
W. S. Schamel	South Bend, Ind.	J. H. Zell	St. Louis, Mo.





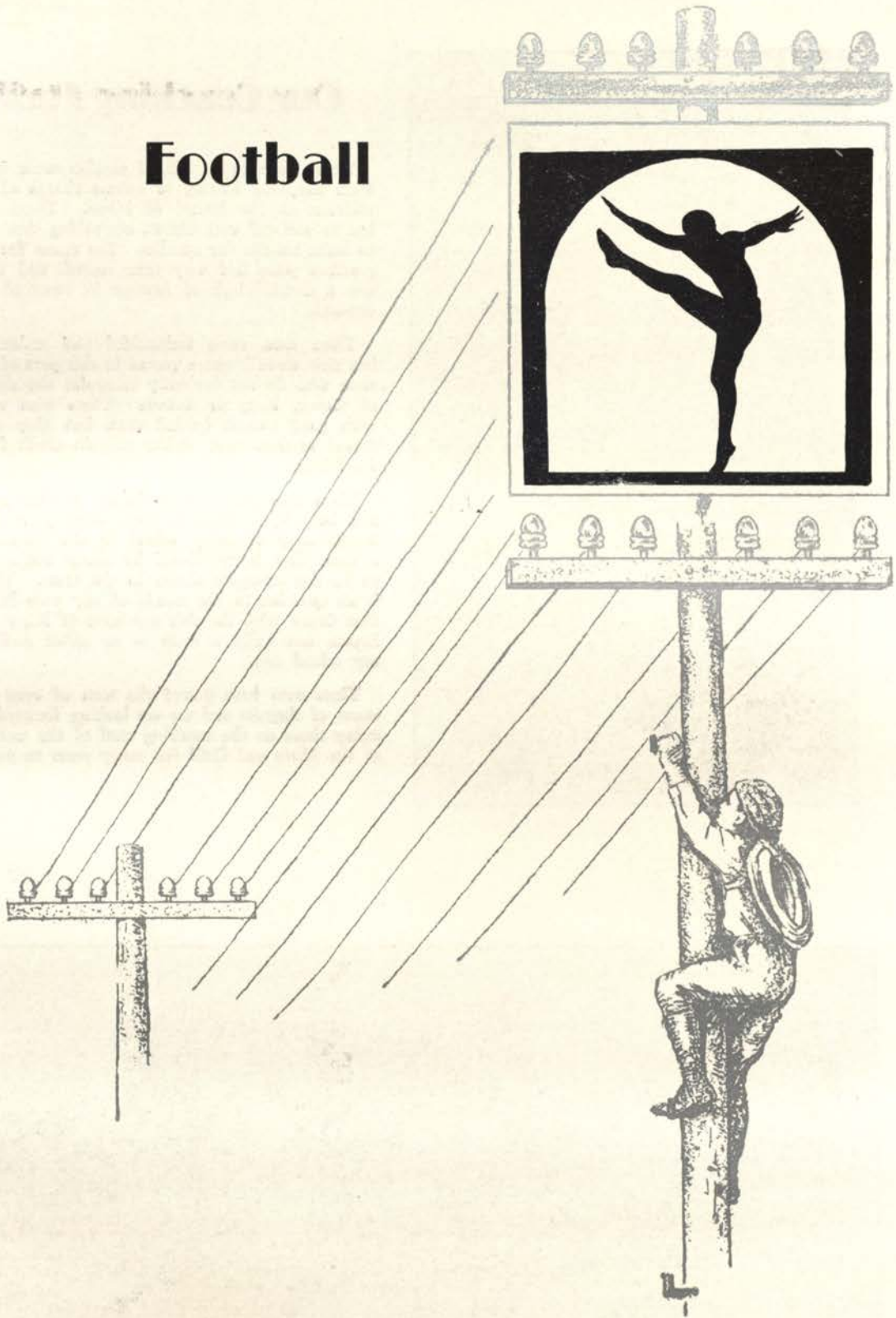
Athletics

In early telephone work, the same instrument was used both as a transmitter and as a receiver. These instruments were leased or loaned in pairs to individuals by Bell. Telephoning was done over a single iron wire with the ground as a return circuit. There were no switchboards.

Edison finally perfected an instrument that was much more satisfactory as a transmitter than that of Bell. Hereafter, Edison's instrument was used as a transmitter and Bell's as a receiver. The telephone above was one such combination in use about 1880-1890.



Football





Our Coaching Staff

Three years ago a trio of coaches came to us from Emporia, Kansas, to assume charge of the athletics at the School of Mines. These men had to contend with almost everything that goes to make trouble for coaches. The teams for the previous years had very poor records and there was a decided lack of interest in most of the contests.

These men came unheralded and unknown, but now there is not a person in this part of the state who do not instantly recognize the ability of Grant, Rapp or Brown. These men came with good records behind them but they were forced to show their ability to gain credit from the Miners.

These men took the candidates as they came and built up a team in these three years that is the envy of every school in the state and a team that is considered by many authorities to be the strongest eleven in the state. There is no question in the minds of any true Miner that Grant with the able assistance of Rapp and Brown can build a team as no other staff of any school can.

These men have passed the tests of even the worst of skeptics and we are looking forward to seeing them on the coaching staff of the wearers of the Silver and Gold for many years to come.



SCHOFIELD, (Captain) Halfback.

"Tex" played his last and by far his best year for the Miners during the past season. His punting ability and his prowess in running back punts stood the Golden Wave in good stead in nearly every game of the season. His absence from the squad next year will leave a gap in the backfield. He could be counted on to give his best in every play.

HASSLER, Fullback.

In all probability the Miners have never had one man who has played as well and as consistently as has Fritz in the past four years. He has played the role of triple threat man and fullback in nearly every game in the four years. His passing ability is equalled by no one in this part of the country. He had little trouble in landing a berth on the all-conference eleven.

THORNTON, Quarterback.

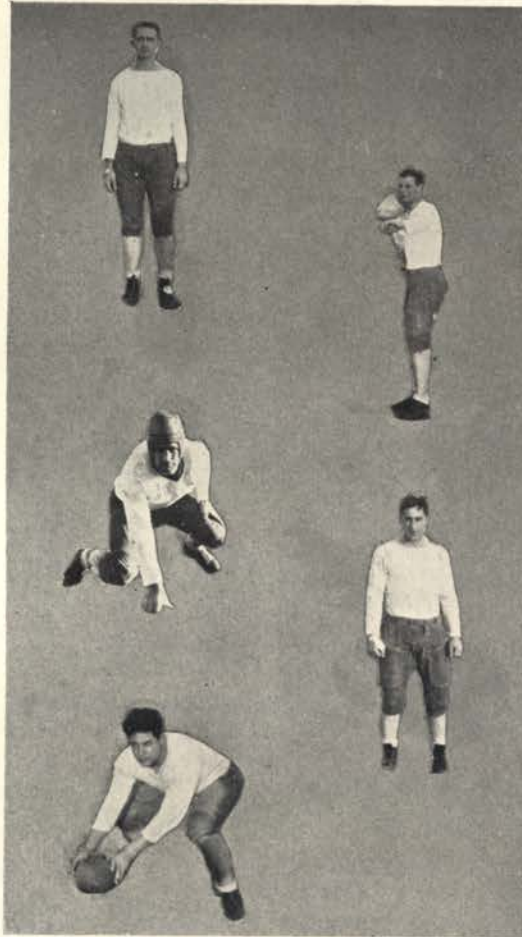
Dick has acted as the field general for the Miners for the past two seasons and his selections of plays combined with his ability as a line plunger has made him a valuable asset to the Golden Wave. Dick gained fame for himself and for the school when he gained a selection as all-state fullback. He will be back next year.

MALIK, (Captain-elect) End.

Three years ago Malik appeared on the field as an insignificant aspirant for a wing position. Such was his ability that after only a few scrimmages he took his place on the varsity and he has had little trouble in holding his place. He is an incomparable pass receiver, and he has tallied many touchdowns for the Miners from this source.

TOMLINSON, Center.

Chunk possessed 215 pounds of brawn and muscle which he certainly used to the best advantage on the gridiron. As a center he was perfect in passing the ball back and he presented a stone wall which was impenetrable when on the defense. His all around ability was instrumental in landing him the center position on the mythical all-state team.





GIBSON, Tackle.

Gibson made a fit running mate for Koch and with a pair of tackles such as this combination turned out to be, opposing backs were constantly being thrown for losses. Gibbie specialized in tackling passers before they could get rid of the ball. He has two more years to play with the Miners and we are expecting still more wonders from him.

MCDONALD, Halfback.

Mac was playing his first year for the Miners and he still has two more to play. His flashy broken field running and his staunch defensive playing placed him among the stars of the latter part of the season. Very seldom were passes completed in this territory. He will undoubtedly be one of the main cogs in the Miner backfield next year.

KOCH, Tackle.

Koch came us us two years ago after playing for two years on the McKendree eleven. He was extremely effective on the defensive and in very few cases did he fail to break thru opposing lines and smear many plays before they had a chance to develop. He was placed in charge of one of the tackles on the all-conference eleven.

SUTHERLAND, Guard.

Coach Grant certainly made a wise change when he switched Suds from fullback to a guard position. Suds used his 200 pounds of brawn as only he knew how to use it and he was one of the main reasons for the famous Miner steam roller attack. He was in every play and he will be still better next fall.

STURM, Tackle.

No harder fighter nor more intense trainer was on the Miner squad than John. If it was in his power to tackle a man that man was tackled. John has still another year to play with the Miners and he will see much more action in the forthcoming season.



LONDRIGAN, End.

Mick played good football this season in spite of the fact that he was greatly handicapped by a bad ankle. He was in every play and it was a real job to get him out of an off-tackle play. He has yet another year to work with the Silver and Gold.

KIRCHOFF, End.

Another new man displayed his wares and was rewarded by seeing plenty of action during the past season. Kirchoff showed especial ability on defensive work and he had little trouble in snaring passes from the air in the near vicinity. We are expecting to see him in action many times during the next season's play.

DeFOE, Guard.

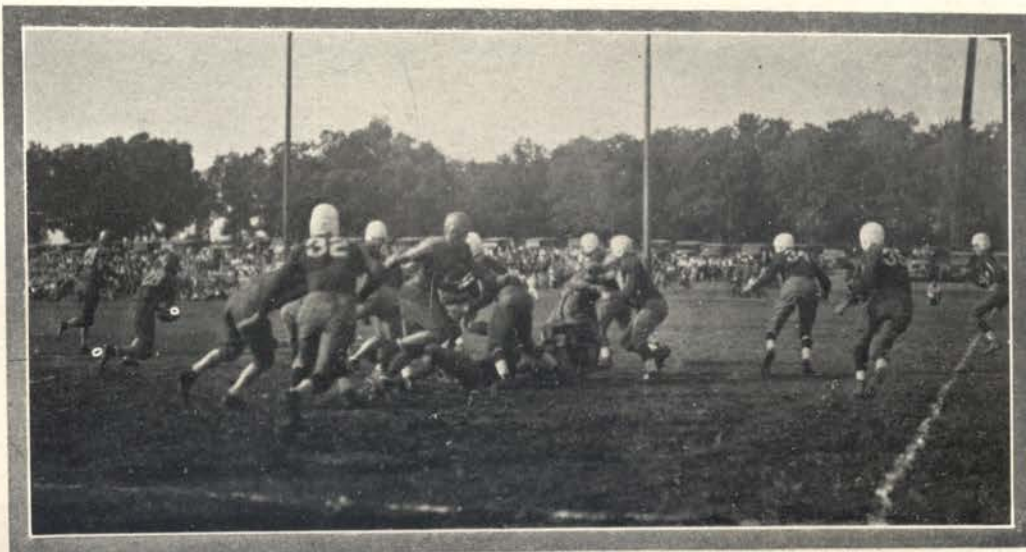
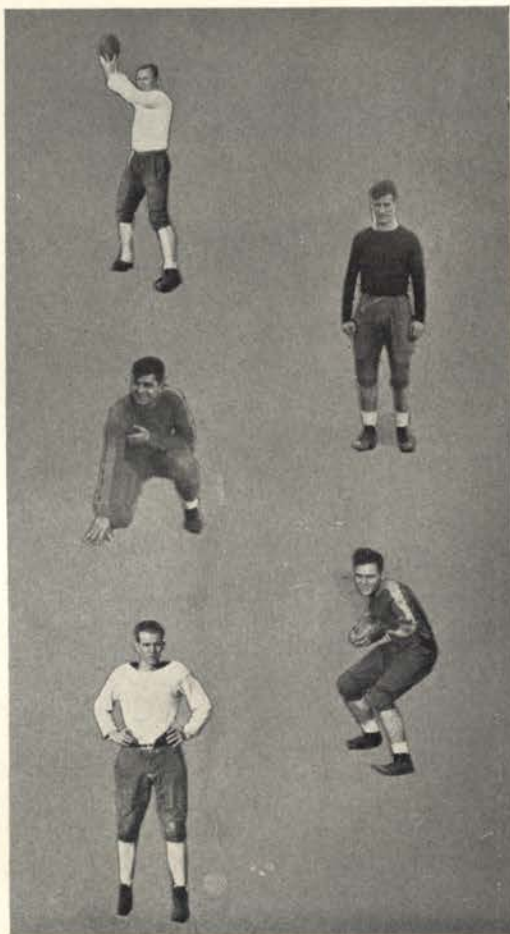
Johnnie played his final year for the Miners and his bulk was essential in helping to make the center of the forward wall comparable only to a stone wall. His loss by graduation next spring will leave a big gap in the center of the line. A bad knee kept him out of some of the games, but he made up for it in the other contests.

WILLIAMS, Quarterback.

Art showed real field judgment in his selection of plays and only his light weight kept him from seeing still more action in the past season. He still had another year to play with the wearers of the Silver and Gold. He will be a valuable asset when Coach Grant starts his men into action next fall.

OSWALD, Tackle.

As to his ability, in playing either guard or tackle it is unquestionable. He has done both very favorably. We expect great things from this freshman next fall.





McCREIGHT, End.

Dick came back strong this season after suffering a broken shoulder blade in the early part of his first year of play with the Miners. His fight and earnestness and good condition was bound to place him among the letter men. He will be back to do still more for the wearers of the Silver and Gold next fall.

KELLY, Halfback.

He was heard of little his first year, but in succeeding years his ability as a broken field runner, earned him a name on the varsity. He was also a real pass receiver, ranking with the best of the Miners.

ORF, Guard.

Another Freshman showed why he was a High School star in enough games to win his letter. Orf played hard football and gained much valuable experience in the games this year. He will prove especially valuable when DeFoe and Sutherland are lost by graduation.



Summary of the Season

MINERS 19, KIRKSVILLE TEACHERS 6

After letting the Teachers get a six-point lead on them in the early part of the game the Miners started opening up in the manner in which Grant had been drilling them all fall and had little trouble in holding their own for the remainder of the half.

It was at the beginning of the second half that the Miners started on the rampage which was to last thruout the season. With Thornton and Hassler smashing thru the line for long gains and Schofield making sprints thru large gaps in off tackle plays the Miners piled up two touchdowns in rapid succession. Grant made a number of substitutions in order to see some of his new men in action. The second string added another touchdown in the last quarter as the final shot sounded the end of the opening game for that famous Golden Wave.

Grant had succeeded in giving all of his first string men a good workout and he was well fitted to select his starting lineup for the next tilt.



MINERS 67; DRURY 6

The fact that Grant knew what he was doing in selecting his men was testified to by one of the largest scores ever piled up by either of the traditional enemies in their annual clash.

The Drury panthers got away to a flying start when they completed a pass which went for a touchdown after only a few minutes of play had passed. The Miners again slow on the start received the kickoff and in less time than it takes to tell it they had tallied their first touchdown.

From that time it was almost a riot. The Miners were scoring from every part of the field and the large crowd of old grads who were back for the annual homecoming affair were given a rare treat. The game finally ended with the third and fourth string men in for the Miners and a one-sided score in spite of the hard fighting put forth by the Panthers up until the final shot had sounded.

MINERS 33; ST. LOUIS U. 33

One of the most thrilling football games that it was ever the pleasure of grid followers to witness, was played in the Walsh stadium in St. Louis when the two strongest teams in the state met.

In less than 5 minutes after the starting whistle had sounded the Billikens had scored two touchdowns and to all appearances the Miners were hopelessly outclassed. After a short time out the Miners elected to receive the next kickoff. With brilliant interference Schofield ran the ball back to the Bills' 45-yard line. On the next play that unstopable plunger in the personage of Thornton crashed through the line and scored a touchdown. A few minutes later another had been added in favor of the Miners after a successful pass. The quarter ended with the Miners on the long end of a 14-13 score.

The thrills were duplicated in the second quarter when the Bills added two more touchdowns. Early in the second half the Miners added a third touchdown, but their new hope was short lived when the Billikens tallied another on their own account. The final period started with the Miners hopelessly trailing by two touchdowns and so the score remained until only 6 minutes of play remained. The Miners staged a last minute rally which made history and with the help of Hyland's ability to snare passes from the fog gained a tie of 33-33 all when Hassler's pass to Malik over the goal line was good for the final point.

MINERS 38; MISSOURI VALLEY 7

The Miners staged a very successful invasion of Missouri Valley camp when the two elevens met for the first time in recent years. Again the game started very slow and the Miners failed to score until late in the second quarter when Hassler gave a wonderful demonstration of passing. He passed twice from the center of the field; once to Malik, who was stopped on the 5-yard line, and again to McDonald, who was over the goal line. Schofield added another touchdown just before the half ended by a nice run around end.

The Miners changed their tactics slightly in the last half and started a line battering which soon wore down the lighter forward wall presented by the Vikings. This style of attack proved equally effective and the Miners had added three more touchdowns in rapid succession.

The hard fighting Vikings staged a last desperate passing attack and they were rewarded by a successful pass over the Miners' goal line only a few minutes before the final shot sounded.

MINERS 13; WESTMINSTER 0

In a much battered and bruised condition after the hard fight with the St. Louis bunch, the Miners drifted listlessly thru the third and last conference clash with the Westminster Blue Jays.

The Miners had all of the weight and experience advantages, but the Blue Jays presented a hard fighting bunch that gave the Miners much trouble. Early in the game the Blue Jays gained possession of the ball and started a march that threatened the Miner goal line. Only after a supreme effort the Miners held on their own 3-yard line and Schofield kicked out of danger. For the remainder of the half the ball was near the middle of the field with both teams doing a great deal of punting.

Early in the second half the Miners unleashed their forces and their charges were not to be denied. Before many minutes of the last half had been played the Miners had scored two touchdowns. Grant immediately ran in a bunch of substitutes to save his varsity for the hard game with the Tulsa bunch which was scheduled for the following week.



MINERS 0; TULSA UNIVERSITY 18

The Miners received their first setback of the season when they tied into the hard fighting undefeated bunch who represented the Tulsa University. The entire game was played in a heavy downpour of rain and fumbles were the rule rather than the exception. Since this was the Miners first experience in handling a wet slippery ball they were at a decided disadvantage.

The Tulsa bunch upheld their reputation for rapid scoring when they scored in less than three minutes after the whistle had sounded. They added two more before the final shot had sounded and in spite of the best efforts of the Miners they failed to cross the enemy goal line for the first and only game of the season.

Several long drives down the field placed the Miners in scoring distance, but each time a fumble would upset all hopes. One pass was perfect over the goal line, but the slippery oval eluded the clutching fingers of the Miner end. The teams were much evened matched than the score would indicate and the final score would have been different on a dry field.

MINERS 39; CHILLICOTHE BUSINESS COLLEGE 0

After a huge display of enthusiasm accompanied by a bonfire the night before, the Golden Wave took the field to show just why they had been proclaimed the strongest team in the state.

After scoring only one touchdown in the first period the entire Miner backfield ran riot and scored from every part of the field. As soon as the Miners gained possession of the ball they were in scoring distance. The Chillicothe bunch displayed a real brand of passing, but their inability to crash thru the Miner forward wall and lack of time in their passes caused their offence to fail.

This was the first set-back for the Business College and they went down fighting to the last but the Miners played their best game of the season, after a series of four games away from home. So ended one of the most successful seasons in the history of Miner football teams for the past score of years.

MINERS BRING GLORY TO SCHOOL

Never since that historic team of 1914 has the School of Mines been so well represented on the gridiron. Never have so many stars been assembled on one team of the Golden Wave.

Members of the eleven gained not only much fame in conference circles, but the Miners gained for more than their part of state recognition. The best part of it all is that only three of the nineteen letter men will be lost via sheepskin next spring. The absence of Schofield and Hassler from the backfield will leave a big gap in that portion of the team and DeFoe will be greatly missed from the center of the line, but with the abundance of reserve material and Grant to build new men, the Miners should have a still greater team next fall.

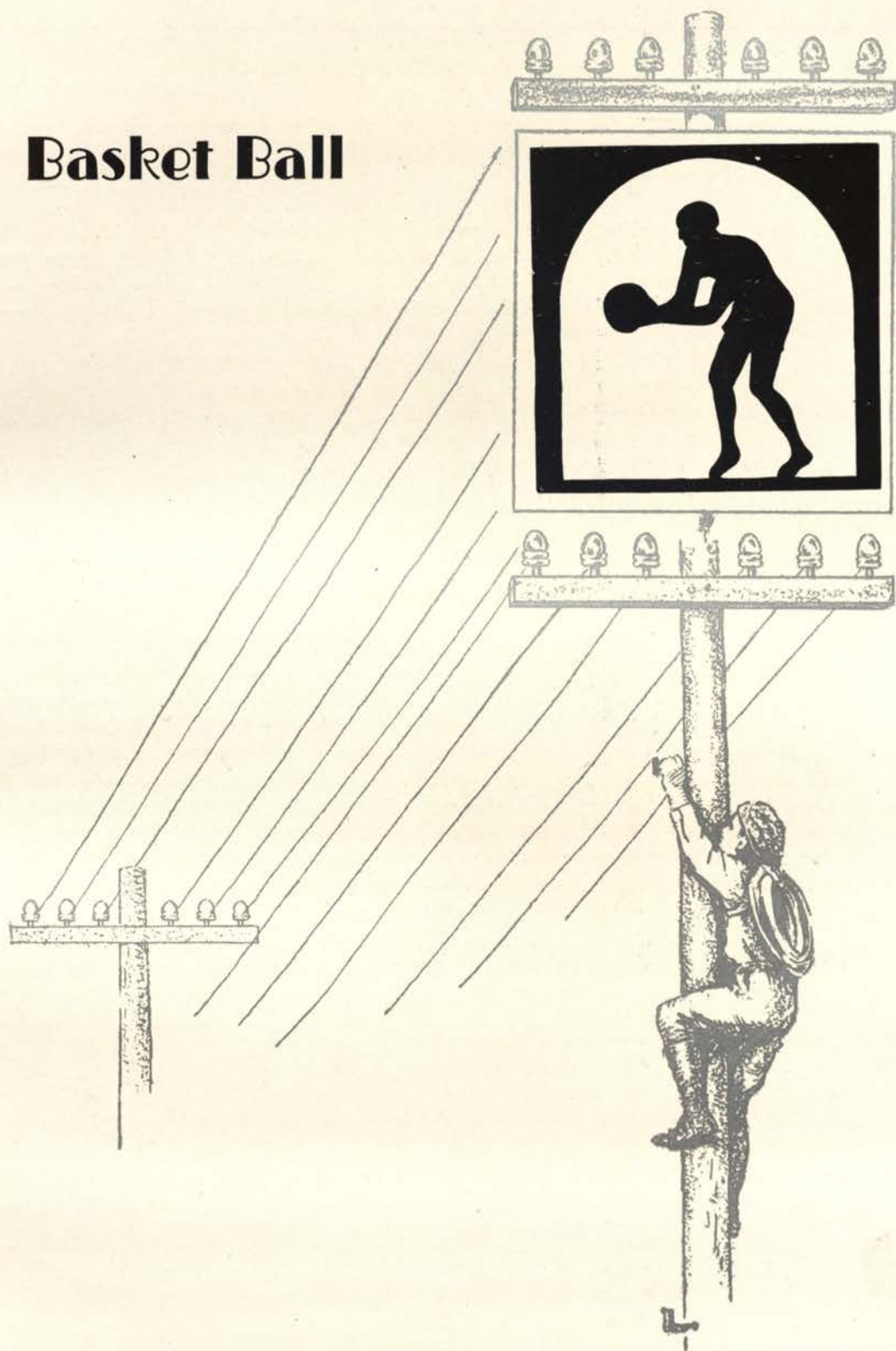
Thornton and Tomlinson gained an honor that is seldom meted out to small schools when they were selected for the fullback and center positions respectively on the all-state eleven. Hassler further added to the glory of the school when he gained honorable mention and a berth in the backfield of the second team. Thornton, Hassler, Koch, and Tomlinson had little trouble in placing on the all M. C. A. U. eleven while the remaining seven of the varsity men received honorable mention from this source. Those receiving honorable mention were Schofield, McDonald, Malik, Londrigan, Gibson, Sutherland, and Andres.

The following scores are a slight indication of the prowess of the Golden Wave:

Miners 19	Kirksville Teachers College	6
Miners 67	Drury	6
Miners 38	Missouri Valley	7
Miners 33	St. Louis	33
Miners 13	Westminster	0
Miners 0	Tulsa	18
Miners 39	Chillicothe Business College	0

Totals: Miners 209; Opponents 70.

Basket Ball





HEILIG, *Captain, guard*. "Doc" has been one of the mainstays on the squad for the past four years and his absence from the quintet next year will leave a big gap.

TITTLE, *guard*. Tittle played his second year with the varsity in great style, and he will be still better in his remaining year of play.

JENKINS, *center*. "Jenks" really knew how to use his great height when he got near the goal. He has two more years to act as the pivot man for the Miners.

BUBAS, *forward*. Bubas was considered by many to be the best forward on a Miner five for the past number of years. All he needed to make a good player was experience. He is only a Freshman.

KERCHOFF, *forward*. Kerchoff is a fit and able running mate for Bubas and less erratic. He, too, is only a Freshman. These two forwards will be hard to stop in the next three years.

JOSLIN, *center*. Joslin made an unusually good showing for his first year. He was ever ready to take the center position and play it well. He will offer Jenkins plenty of competition.

GROSS, *forward*. Benny proved to be a fast and accurate forward when his chances to play arrived near the end of the season. He will be back two more years and is sure to see plenty of service.

MORELAND, *guard*. Chick is a hard and steady player who would be valuable to any team. He looked good in each instance when he was called on to play. He will be back next year.

RICHMOND, *guard*. Richmond was ready when Coach Rapp called for substitute guards. He, too, will see plenty of action in the next two years.



MINER BASKETEERS CRASH THROUGH—

FINISH WELL UP IN CONFERENCE

The Miners were creditably represented on the basketball court this season for the first time in recent years. The proteges of Coach Rapp very successfully carried on the work started by Coach Grant and his unsurpassable string of football players. The Miners were considered one of the strongest quintets in the conference and only three teams of the conference were able to surpass the sharpshooters who wore the Silver and Gold.

The fact that three Freshmen constituted the mainstays of the Miner combinations indicates that Rapp will have an unstopable quint on the court next season. In the season's play the Miners piled up 453 points while the combined efforts of their opponents netted only 394 points. In no game were the Miners beaten by more than two or three goals and in the majority of cases the breaks of the game decided the winner.

Bubas and Kirchoff, both Freshmen, demonstrated to the entire satisfaction of Coach Rapp and all of the Miner backers that they were capable of taking care of the forward positions of any team in this section of the country. With still another year's experience to their credit they will be capable of contributing more than their share to a championship team next year. Jenkins and Joslin, Sophomore and Freshman, respectively, shared honors at the center position. Both were excellent as the pivot man in Rapp's fast-breaking offensive plays. Much credit is due to Tittle and Captain Heilig, who played the guard positions as only veterans of the court could. These men wrecked numerous enemy plays before they were fairly started, and lucky was the opposing forward who could get his hands on the ball for a follow-up shot. Any one of the six men was good for a counter if given half a chance to flip the ball toward the loop.

All in all Rapp presented a strong combination for every game, and since Heilig is the only man who will be lost by graduation this spring, the Miners will be satisfied with nothing less than a championship next year.

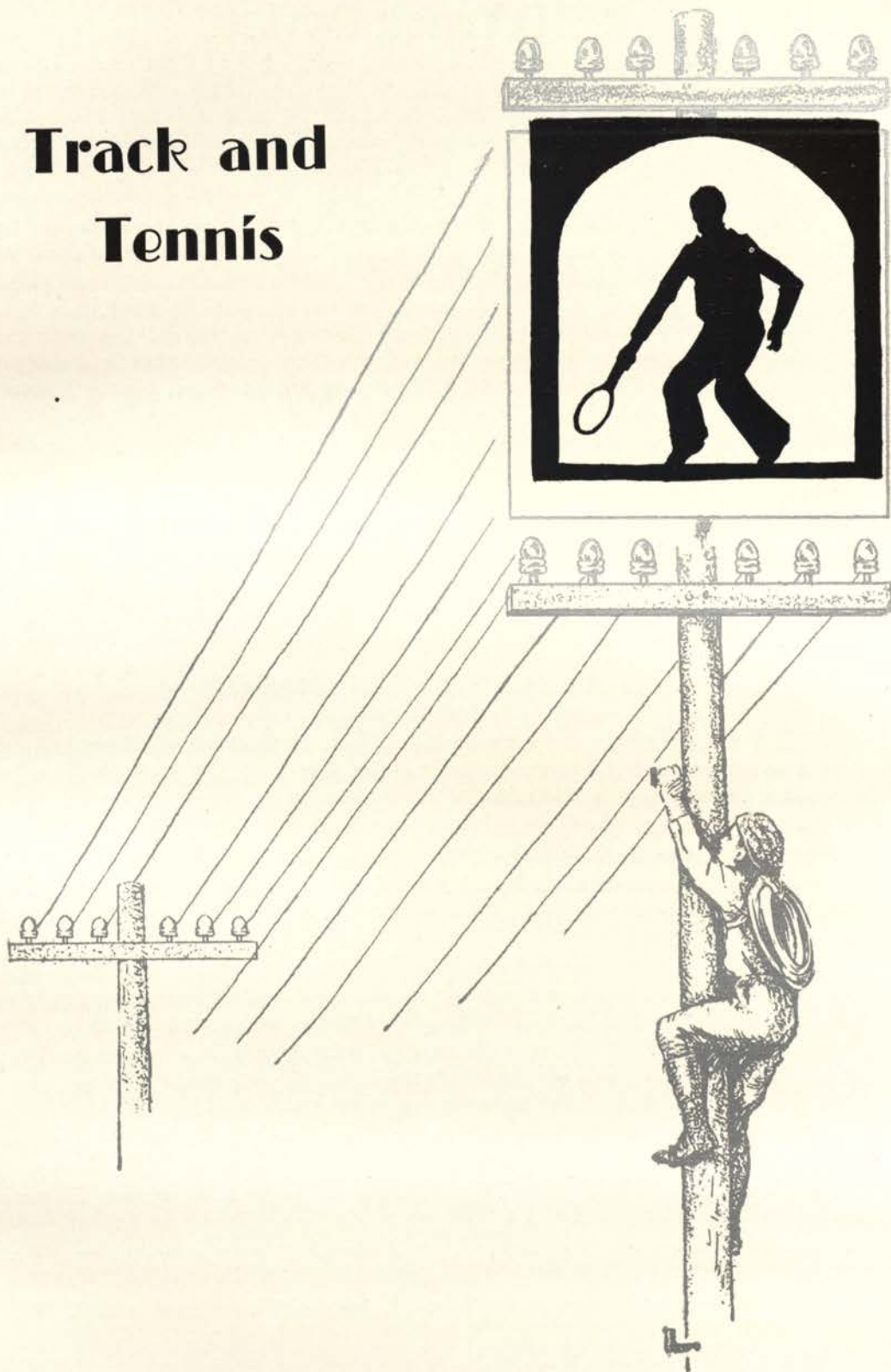
SCHEDULE

Dec. 6	Miners 23	Concordia 17—in St. Louis.
Dec. 18	Miners 14	Cape Girardeau Teachers 19—in Cape Girardeau.
Jan. 17	Miners 35	Springfield Teachers 45—in Springfield.
Jan. 23	Miners 28	Drury 31—in Springfield.
Jan. 30	Miners 24	Missouri Valley 16—in Marshall.
Jan. 31	Miners 19	William Jewell 26—in Liberty.
Feb. 3	Miners 23	Missouri Valley 16—in Rolla.
Feb. 6	Miners 41	Culver-Stockton 26—in Rolla.
Feb. 7	Miners 26	Culver-Stockton 17—in Rolla.
Feb. 13	Miners 39	Westminster 23—in Fulton.
Feb. 17	Miners 40	Westminster 38—in Rolla.
Feb. 19	Miners 22	Central College 24—in Rolla.
Feb. 20	Miners 25	Central College 33—in Rolla.
Feb. 27	Miners 43	Drury 28—in Rolla.
Feb. 28	Miners 41	Springfield Teachers 35—in Rolla.



- Dec. 6 Miners 23—Concordia 17. The Miners surprised everyone when they displayed unexpected talent and ousted the sharp shooters from Concordia Seminary.
- Dec. 18 Miners 14—Cape Girardeau 19. Again the Miners played good ball, but a final splurge by the Teachers left the Golden Wave on the small end of the score.
- Jan. 17 Miners 35—Springfield Teachers 45. Another game sacrificed to experience and the smoothing out of the kinks in that Golden Wave.
- Jan. 23 Miners 28—Drury 31. After leading practically all of the game the Miners made a number of fouls which proved sufficient for the Panthers to win.
- Jan. 30 Miners 24—Missouri Valley 16. The Silver and Gold players hit their stride at last and had little trouble in trouncing the Vikings.
- Jan. 31 Miners 19—William Jewell 26. A second game in successive nights proved too much for the youngsters who represented M. S. M.
- Feb. 3 Miners 23—Missouri Valley 16. A couple of days of rest and the Miner quint easily duplicated their victory over the Vikings.
- Feb. 6 Miners 41—Culver-Stockton 26. The wearers of the Silver and Gold really blazed a trail in their first home game of the season.
- Feb. 7 Miners 26—Culver-Stockton 17. That winning streak continued and the fellows received a great ovation as they again were victorious.
- Feb. 13 Miners 39—Westminster 23. The Blue Jays were as easy on the court as they were on the gridiron this season for the fighting Miners.
- Feb. 17 Miners 40—Westminster 38. Some fleshy playing on the part of the Blue Jays almost cost the Miners a victory in the second game.
- Feb. 19 Miners 22—Central 24. The Miners were unable to make even a slight percentage of their free throws good. It was the fastest game of the season.
- Feb. 20 Miners 25—Central 33. Again the experienced players who represented the Eagles were too much for the Miners.
- Feb. 27 Miners 43—Drury 28. The Miners received just revenge for a previous defeat at the hands of the Panthers.
- Feb. 28 Miners 41—Springfield Teachers 35. Another revenge game was sweet for the Miners as they ended a very successful season.

Track and Tennis



1930 Track Review

Out of the cloud that surrounded the track team of 1929 there emerged several men who were real stars on the track and field this year. Once again the squad was composed largely of men from the lower classes, but this time there was a radical difference in the caliber of the men entering the contests. One year of extensive training under a man who knows his athletics as Coach Grant does would bring out the best in any man.

Only lack of material caused the Miners to suffer defeat on the track and field this year. Where material was available the Miners could generally be counted on to win.

The Golden Wave was exceptionally strong in the middle distance and the mile relay. The mile relay team won every start with the exception of the Kansas Relay. Monroe, the star on the entire squad, won his major event, the half-mile, in every meet in which he was entered. He ran anchor man for the mile relay team, and also took part in the quarter mile dash and the half mile relay team in several meets. Monroe is to be captain next year.

With every letter man on the team eligible to be back with the Miners next year, and with Coach Grant to properly instruct the new candidates, the Miners should have a team which will truly represent them as they should be represented.

Most of the scores in the meets this season were close, but if they are close next year, the Miners will probably be on the long end of the score.

The letter men of this season's squad and men who will be back for another year to carry the Silver and Gold faster and farther, are: Monroe (Captain), Davis, Coghill, McCreight, Miller, Gevecker, Koch, Kauffman, Hilegman.

Summary of the Season

TRIANGLE MEET

The Westminster Blue Jays again walked off with the honors in the annual triangle meet between the Miners, Westminster and Central Wesleyan. This gave the Blue Jays a fourth straight victory in this meet.

Altho the Miners placed second they were well behind the leaders. The final scores were Westminster 92, Miners 45, and Central Wesleyan 7.

Boyd, ace trackster from the Blue Jay squad, was easily the outstanding star of the meet with four firsts and one second to his credit. Six letters were earned by the Miners in this initial appearance.

The mile relay team composed of Monroe, McCreight, Coghill, and Gevecker easily won a first place as did Monroe in the half-mile run. The other letters went to Davis and Koch who placed first in the 200-yard dash and shot put respectively.

Coach Grant was well pleased with the first performance of his inexperienced men and foresaw the development of some real stars.

SUMMARY OF EVENTS

100-Yard Dash—Frankenfeld, Westminster, first; Thurman, Central Wesleyan, second; Davis, Miners, third. Time 10.4.

220-Yard Dash—Davis, Miners, first; Thompson, Westminster, second; Thurman, Central Wesleyan, third. Time 22.8.

440-Yard Dash—Bell, Westminster, first; McCreight, Miners, second; Crews, Westminster, third. Time 53.4.

880-Yard Dash—Monroe, Miners, first; H. Barrow, Westminster, second; Miller, Miners, third. Time 2:05.8.

Mile Run—C. Barrow, Westminster, first; Cummings, Miners, second; McKnelly, Westminster, third. Time 4:56.1.

Two-Mile Run—C. Barrow, Westminster, first; Robnett, Westminster, second; Horn, Miners, third. Time 11:34.6.

TRIANGLE MEET— Continued

120-Yard High Hurdles—Talbot, Westminster, first; Boyd, Westminster, second; Summers, Central Wesleyan, third. Time 15.6.

220-Yard Low Hurdles—Talbot, Westminster, first; Coghill, Miners, second; Wiley, Westminster, third. Time 25.4.

Shot Put—Boyd, Westminster, first; Koch, Miners, second; Lacey, Miners, third. Distance 41 feet 4 inches.

Javelin—Koch, Miners, first; Howard, Westminster, second; Hall, Westminster, third. Distance, 150 feet 8 inches.

Discus—Boyd, Westminster, first; Crews, Westminster, second; Lacey, Miners, third. Distance 121 feet.

Pole Vault—Boyd, Westminster, first; Kauffman, Miners, and Wiley, Westminster, tied for second. Height 11 feet.

Broad Jump—Boyd, Westminster, first; Talbot, Westminster, second; Schofield, Miners, third. Distance 11 feet 11 inches.

High Jump—Edwards, Westminster, first; Yantis, Westminster, and Hilegman, Miners, tied for second. Height 5 feet 8 inches.

Half-Mile Relay—Westminster (Boyd, Crews, Talbot, Thompson) first; Miners, second. Time 1:33.3.

Mile Relay—Miners (McCreight, Gevecker, Coghill, Monroe), first; Westminster, second. Time 3:56.6.

Lettermen

MONROE (Captain-elect)—"Rex" was easily the outstanding star of the squad this season. He easily won his main event, the half-mile, in every start. He also was a big cog in both relays and he ran the quarter with no mean ability. He truly deserves the captaincy for next year.

DAVIS—Davis was another star who came from the ranks of past season's squad. His chief worries were the 100 and 220-yard dashes. He could always be counted on to place in these events and new records meant nothing to him. He also ran in the relays.

COGHILL—Altho Coghill was only a Freshman he proved to be one of the most valuable assets to the Golden Wave. His fast working legs carried him over the hurdles in an incredibly short time. His work in the relays and in the quarter alone was enough to gain him recognition.

MCCREIGHT—"Mac" came back strong from his work as a Freshman and proceeded to make himself one of the stars of the team. His intensive training always kept him in condition and one could be sure that he would be there when things happened in the quarter. He was a regular in the relays.

MILLER—Another Freshman who really possessed the goods. "Ben" reported rather late in the season but he showed a stride which soon gained notice. He lettered as a member of the mile relay team and did some very creditable work in the quarter and half mile.

GEVECKER—Gevecker came to us from Washington U and altho he had very little track experience he worked with a willingness which was sure to get him places. His events were the mile relay and the quarter and half mile.

KOCH—Altho Koch's leaning in the sports was toward football, he answered Coach Grant's call for material in the field events and developed a knack in heaving the javelin and shot which gained him a permanent place on the team. He has another year to do his stuff for the Miners.

KAUFFMAN—An inconspicuous Freshman worked out regularly in the pole vault. The coach took him along on a trip to fill in his squad. The Freshman vaulted 12 feet. That Freshman was Kauffman, who will carry the Silver and Gold over the bar for three more years.

LETTER MEN—Continued

HELIGMAN—Again a Freshman answered the call. Heligman worked with a will and was rewarded for his work. He developed a form and technique in the high jump which bids fair to gain him much fame in his remaining three years with the Miner track squad.

CUTLER—No one questions the fact that Cutler really worked and trained for his events. His inexperience handicapped him to a great extent, but he has three more years to work with the Golden Wave. He deserved his letter and will probably make many more.

MINERS vs. DRURY

Again a lack of entrants in the field events played havoc with the Miner trackmen. As a result the Drury representatives nosed them out by the close score of 69-65. This meet proved to be one of the closest of the season for the Miners.

Four new records for the Miner track were set up as the Miner crack half-mile relay team broke the tape in exactly one minute 35.6 seconds, which lowers the previous record of 1 minute and 37 seconds made by the team of 1926. McCreight stepped the quarter in 53.1 seconds which time was .2 seconds better than any previous mark. Robb, star of the Drury men, shattered both the 100 and 220-yard marks, the respective times being 9.8 and 23.1 seconds.

The showing made by the men wearing the Silver and Gold was by far the best made by any team in the last several years. The new men manifest still more promise to develop into a real team.

SUMMARY OF EVENTS

100-Yard Dash—Robb, Drury, first; Davis, Rolla, second; Schofield, Rolla, third. Time 9.8. (New record).

220-Yard Dash—Robb, Drury, first; Davis, Rolla, second; Cutler, Rolla, third. Time 22.3. (New record).

440-Yard Dash—McCreight, Rolla, first; Monroe, Rolla, second; Handley, Drury, third. Time 53.1. (New record).

High Hurdles—Talbot, Drury, first; Handley, Drury, second; Rolla, disqualified. Time 16.8.

Mile Run—Stoneman, Drury, first; Cummins, Rolla, second; Latimer, Drury, third. Time 4:54.2.

Two-Mile Run—Prock, Drury, first; Johnson, Drury, second; Horn, Rolla, third. Time 11:42.9.

Low Hurdles—Talbot, Drury, first; Coghill, Rolla, second; Sewell, Drury, third. Time 2:07.7.

880-Yard Run—Monroe, Rolla, first; Latimer, Drury, second; Wilson, Rolla, third. Time 2:07.7.

Half-Mile Relay—Won by Rolla. Time 1:35.6. (New record).

Mile Relay—Won by Rolla. Time 3:37.6.

Pole Vault—Kauffman, Rolla, first; Davenport, Rolla, second; Drury did not qualify. Height 11 feet.

High Jump—Bush, Drury, first; Heligman, Rolla, and Sewell, Drury, tied for second. Height 5 feet 7¼ inches.

Discus—Bush, Drury, first; Sutherland, Rolla, second; Lacy, Rolla, third. Distance 108 feet 5½ inches.

Shot Put—Bush, Drury, first; Cook, Rolla, second; Lacy, Rolla, third. Distance 37 feet 4 inches.

Javelin—Bush, Drury, first; Koch, Rolla, second; Reeves, Rolla, third. Distance 160 feet 3 inches.

MINERS vs. DRURY—Continued

Broad Jump—Robb, Drury, and Schofield, Rolla, tied for first; Dow, Drury, third. Distance 19 feet 11 inches.

ARKANSAS WINS ANOTHER

An inexperienced squad journeyed to Arkansas but proved to be no match for the more experienced men who represented the Arkansas College.

The Golden Wave made a noble effort, inexperience and lack of entrants in field events cost heavily in the second meet of the season.

Davis, Monroe, Coghill, Koch, and the relay team consisting of McCreight, Miller, Coghill, and Monroe were the only first place accounted for by the Miners.

Score—Arkansas, 84; Miners, 48.

SUMMARY OF EVENTS

120-Yard Dash—Caldwell, Arkansas, first; Towse, Miners, second. Time 17.8.

100-Yard Dash—McDow, Arkansas, first; Davis, Miners, second; McHead, Arkansas, third. Time 10.00.

One Mile—Greyshun, Arkansas, first; Adams, Arkansas, second; Hichman, Miners, third. Time 4:36.

220-Yard Dash—Davis, Miners, first; McDow, Arkansas, second; McLeod, Arkansas, third. Time 22.4.

440-Yard Dash—Greyshun, Arkansas, first; McCreight, Miners, second; Gevecker, Miners, third. Time 53.2.

Two Mile—Gnnis, Arkansas, first; Adams, Arkansas, second; Hickman, Miners, third. Time 10:37.5.

220-Yard High Hurdles—Coghill, Miners, first; second and third went to Arkansas. Time 27.

880-Yard—Monroe, Miners, first; Jackson, Arkansas, second. Time 2:01.1.

Half-Mile Relay—(Treece, Cooper, Holmes, Greyshun) Arkansas. Time 1:36.

Mile Relay—(McCreight, Miller, Coghill, Monroe) Miners. Time 3:34.

Pole Vault—Jackson, Arkansas, first; Dale, Arkansas, second; Kauffman, Miners, third. Height 12 feet.

Discus—Creighton, Arkansas, first; Stevens, Arkansas, second; Lacy, Miners, third. Distance 129 feet 2 inches.

High Jump—Hicks, Arkansas, first; Caldwell, Arkansas, second; Heligman, Miners, third; fourth was tie. Height 5 feet 10 inches.

Shot Put—Gardner, Arkansas, first; Creighton, Arkansas, second; Koch, Miners, third. Distance 40 feet 7 inches.

Javelin—Koch, Miners, first; Towse, Miners, second; Hicks, Arkansas, third. Distance 158 feet 4 inches.

Broad Jump—Schoonover, Arkansas, first, Kauffman, Miners, third. Distance 20 feet 8 inches.

MINERS vs. SPRINGFIELD TEACHERS

The Golden Wave again had to be content with the little end of a 77 to 58 score, altho the Miner representatives displayed a brand of work that vouches for much work on the part of the coach and the men on the squad.

Davis and Monroe were easily the outstanding men of the meet. Davis won both dashes very handily and contributed his part in the half-mile and the mile relay. Monroe won both the half and quarter-mile runs and ran anchor in the relays. Kauffman contributed the only other first place in the field events by winning the pole vault at a height of 11 feet 1 inch.

MINERS vs. SPRINGFIELD TEACHERS—Continued

In spite of the fact that the Miners won 7 firsts in this meet the lack of seconds and thirds caused them to lose the meet. With more material the Miners could have easily reversed the score in the fairly close meet.

Much valuable experience was gained by the new men who were working for the Miners.

SUMMARY OF EVENTS

100-Yard Dash—Davis, Rolla, first; Schofield, Rolla, second; Spradling, Springfield, third. Time 10.4.

220-Yard Dash—Davis, Rolla, first; Hillshouse, Springfield, second; Coghill, Rolla, third. Time 23.2.

440-Yard Dash—Monroe, Rolla, first; McCreight, Rolla, second; Hillshouse, Springfield, third. Time 54.4.

880-Yard Run—Monroe, Rolla, first; Boothe, Springfield, second; Miller, Rolla, third. Time 2:06.3.

Mile Run—Perkins, Springfield, first; Jarvis, Springfield, second; Cummins, Rolla, third. Time 4:51.3.

120-Yard High Hurdles—Wardell, Springfield, first; Miner, Springfield, second; Towse, Rolla, third. Time 17.1.

220-Yard Low Hurdles—Wardell, Springfield, first; Coghill, Rolla, second; Towse, Rolla, third. Time 27.2.

Mile Relay—Rolla, first (Coghill, Cutler, McCreight, Davis). Time 3:46.3.

Two-Mile Run—Perkins, Springfield, first; Farmer, Springfield, second; Hickman, Rolla, third. Time 10:34.4.

Half-Mile Relay—Rolla, first (Coghill, Cutler, McCreight, Davis). Time 1:28.3.

Pole Vault—Coffman, Rolla, first; Newton, Springfield, second; no third. Height 11 feet 1 inch.

Javelin—Parker, Springfield, first; Towse, Rolla, second; Elliott, Springfield, third. Distance 166 feet 8 inches. (New record).

Shot Put—Roberts, Springfield, first; Adams, Springfield, second; Koch, Rolla, third. Distance 38 feet 5½ inches.

High Jump—Adams, Springfield, first; Bowen, Springfield, and Heligman, Rolla, tied for second. Height 5 feet 9 inches.

Discus—Grant, Springfield, first; King, Springfield, second; Lokey, Rolla, third. Distance 110 feet.

Broad Jump—Wardell, Springfield, first; Bowen, Springfield, second; Schofield, Rolla, third. Distance 20 feet 3½ inches.

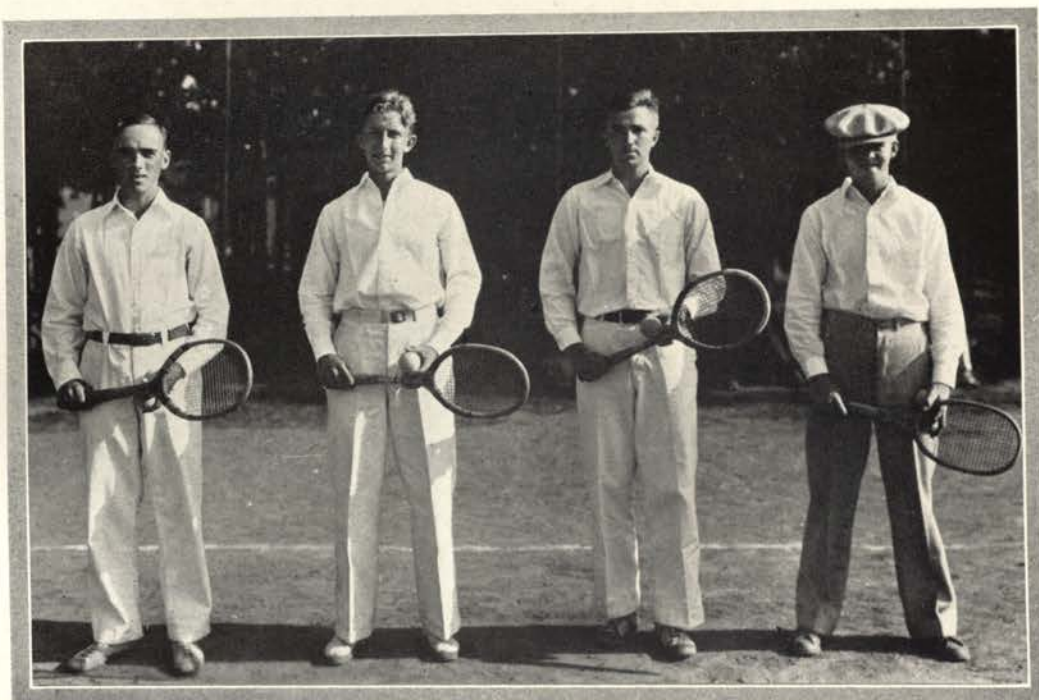
STATE MEET

The Westminster Blue Jays had little trouble in winning the Annual State Meet at Columbia in which the Miners were also entered. Only those men who had been doing very creditable work on the track and field were taken to Columbia, and they succeeded in winning their share of the points.

Rex Monroe again came to the front by winning the half-mile run in a driving rain and assisting McCreight, Davis and Coghill in winning the mile relay. In addition to these two first places McCreight and Davis finished fourth in the quarter and 220-yard dashes respectively, while Kauffman tied for second in the pole vault and Heligman tied for third in the high jump.

Doubtless under more favorable conditions the Miners could have made a much more favorable showing but with the total burden resting on the shoulders of seven men little more could be expected.

Tennis Survey



For the first time in a good many years the Miners were on the tennis courts in inter-collegiate matches. Little interest in the student body as a whole was manifest in the early spring, but as the season progressed and the team continued to win most of their start they began to draw a good sized gallery at the meets.

A round robin tournament was held to decide the members of the team, with Coach Brown in charge of the team. Handley, Tieman, Mertz and Thoroughman were the successful ones in the tournament and were selected to represent the school, playing as they were mentioned above.

This team was taken to Springfield by Coach Brown where they made their initial appearance against the Springfield Teachers. The quartet wearing the Silver and Gold had little trouble in winning the three single matches to win the meet. Handley playing the number one man for the Miners ousted the Teachers best only after three sets with scores of 6-8, 7-5, and 6-3. Tieman defeated his man in straight sets to the tune of 6-3, and 6-1, while Thoroughman took his man into camp with a strong comeback in the final two sets, his scores being 1-6, 6-3, and 6-1. The doubles team composed of Handley and Tieman lost to Lucas and Hitchcock by a score of 4-6, 7-5, and 6-3. Mertz and Thoroughman had little more luck, losing to Jackel and Martin by scores of 6-2, and 7-5.

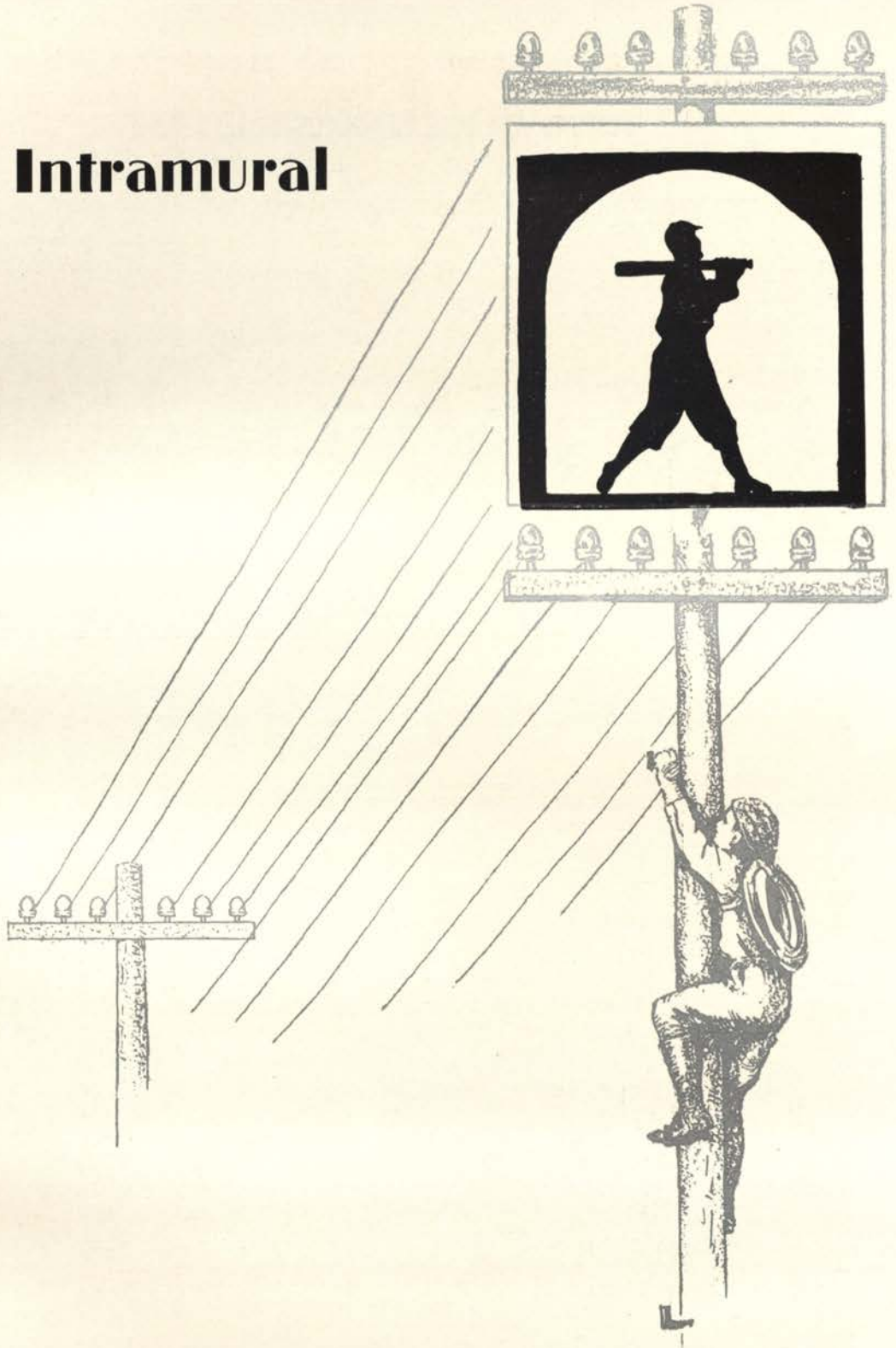
The net artists again swung into action against the Drury net-men but the meet was stopped by a downpour of rain after only three of the matches had been played. Handley won in straight sets from Hyder with scores of 6-4, and 6-2, while Thoroughman dropped his match in as many sets to Kline. Tieman lost his match to Coppage in a hard-fought three set match with scores of 1-6, 6-3, and 7-5. At the time of the rain Mertz was even up in sets, Handley and Tieman were winning, and Thoroughman and Mertz were losing in the doubles matches.

The real fame of the year came when Handley journeyed to the state meet and carried off all honors placing first in a large number of entrants. Handley drew a bye in the first round and easily defeated his opponents in the semi-finals and the finals without as much as losing a set. Handley and Tieman were ousted in the first round of the doubles by the Tarkio bunch who later won the doubles championship.

All in all the season was most successful for the Miners, and the future for this branch of sports is very bright.



Intramural



Intra-Mural Basketball 1931



INDEPENDENT "B"
SCHOOL CHAMPIONS



PROSPECTORS
INTRA-FRATERNITY CHAMPIONS

FINAL STANDINGS

Independent "B"	10	0	1000
Prospectors	9	1	900
Sigma Nu	8	2	800
Lambda Chi	6	4	600
Independent "A"	5	5	500
Pi K. A.	4	6	400
Bonanza	4	6	400
Mercier	3	7	300
Triangle	3	7	300
Kappa Alpha	2	8	200
Kappa Sigma	1	9	100

Intra-Mural Baseball 1930

Baseball last year was split into two leagues: the Inter-Fraternity league consisting of Kappa Alpha, Lambda Chi, Triangle, Mercier, Pi Kappa Alpha, Kappa Sigma and Prospectors teams; and the Independent league having the Bonanza, Sigma Nu, Independent "A" and Independent "B" teams.

In the Inter-Fraternity league the Pi K. A. team with Hilton on the mound captured the cup by virtue of a clean slate. The Lambda Chi and Prospector nines tied for second place. While the Mercier Club clinched third place.

In a playoff game of an unfinished schedule the Sigma Nu team won from Independent "A" and was credited with the Championship of that league.

STANDING

INTER-FRATERNITY LEAGUE

	W	L	%
P. K. A.	7	0	1000
Prospectors	5	2	714
Lambda Chi	5	2	714
Mercier	4	3	571
Kappa Sigma	3	4	428
Triangle	1	6	142
Kappa Alpha	0	7	0

INDEPENDENT LEAGUE

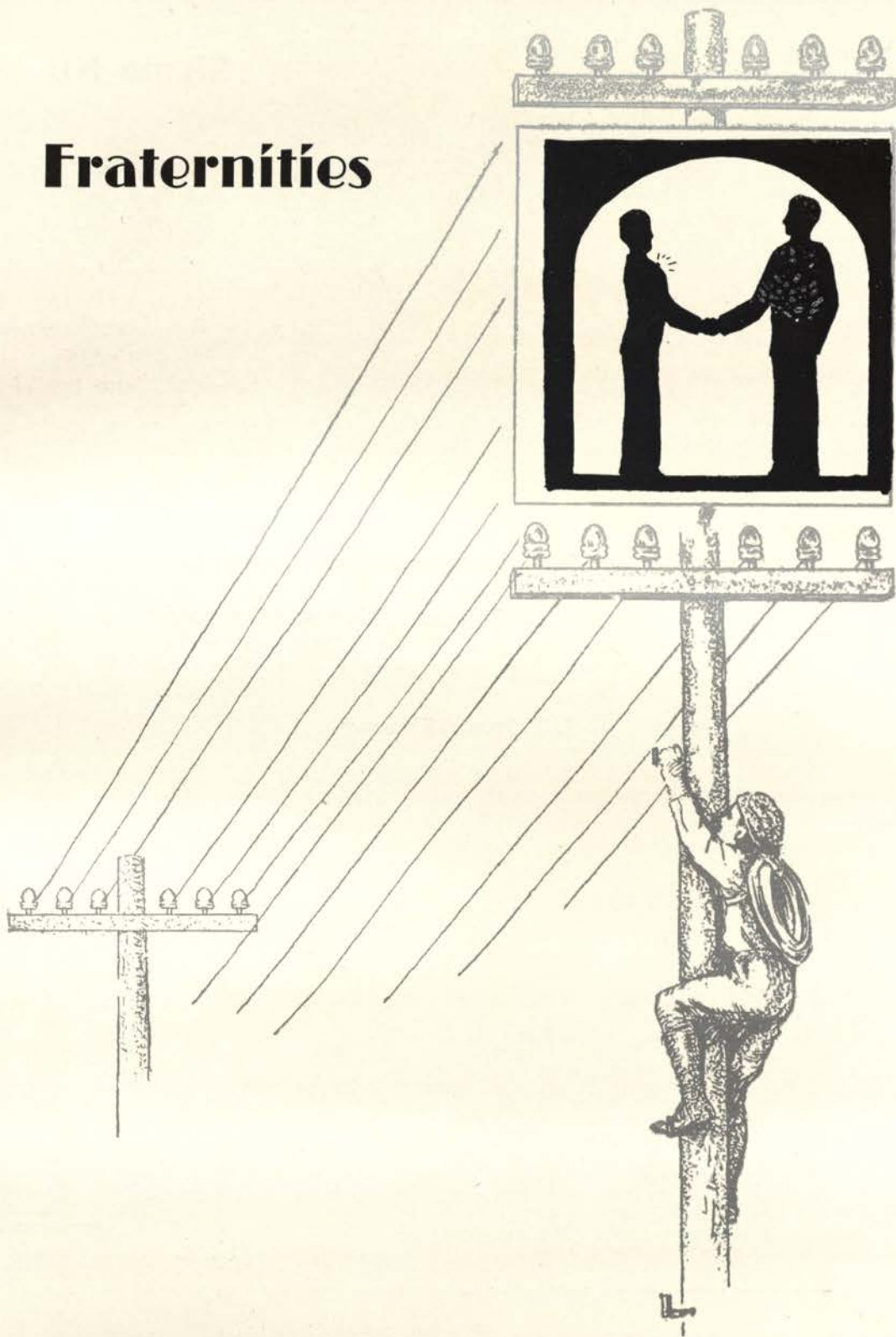
Sigma Nu	4	2	666
Independent "A"	3	3	500
Independent "B"	2	2	500
Bonanza	1	3	250



Organizations

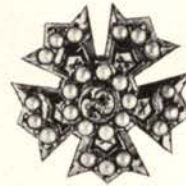
In 1878 the first switchboard was installed at New Haven, Connecticut. From then on, countless changes were made, from the early types shown, through the well-known desk telephone shown above, to the dial phone. Lines were improved from the old single iron wire type to the present copper open wire systems and the aerial cable, and underground cable system.

Fraternities





Sigma Nu



Founded at Virginia Military Institute, Jan. 1, 1869.

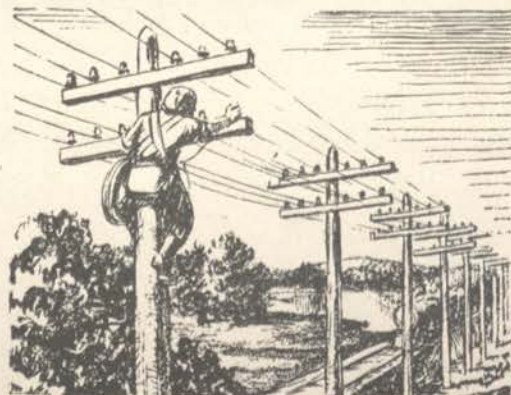
*Gamma Xi Chapter Installed
Jan. 1, 1903*

W. B. SCHOFIELD, *Eminent Commander*

R. E. McCORMICK, *Lieutenant Commander*

R. S. GREEN, *Secretary*

J. T. STURM, *Treasurer*



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H. B. Haddock
A. R. Oswald
E. E. Schofield
W. W. Coghill
R. W. Simpson





Kappa Alpha



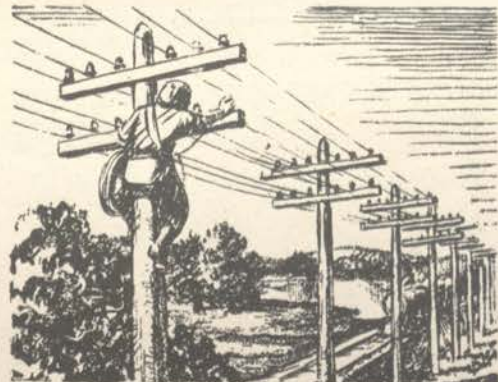
Founded at Washington-Lee University Dec. 21, 1865.

*Beta Alpha Chapter Installed
April 27, 1903*

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C. S. WHITE, Vice-President

A. W. HAPPY, Secretary



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Kappa Sigma



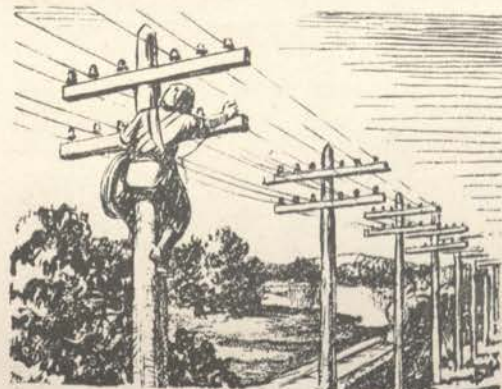
*Founded at University of Virginia
Dec. 10, 1869*

*Beta Chi Chapter Installed Nov. 5,
1903*

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S. M. MOLLOY, Grand Procurator

E. O. CRAWFORD, Grand Scribe



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Pi Kappa Alpha



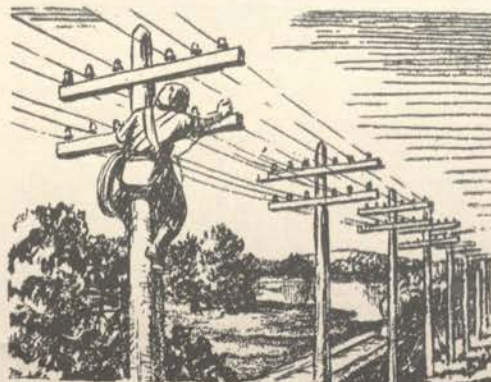
*Founded at University of Virginia
March 1, 1868*

*Alpha Kappa Chapter Installed
Dec. 2, 1905*

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W. H. MAKIN, Secretary-Treasurer



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Prospector Club



Founded October 1, 1913

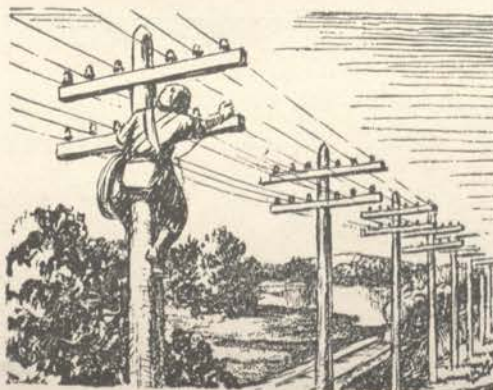
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Bonanza Club



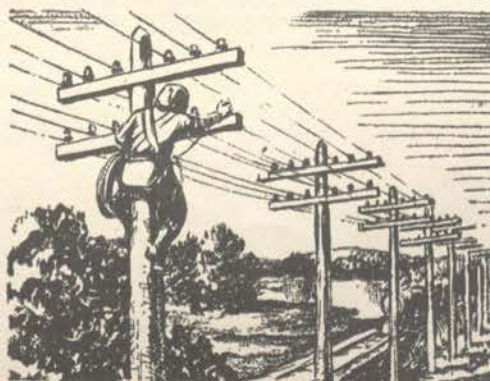
Founded November 14, 1916

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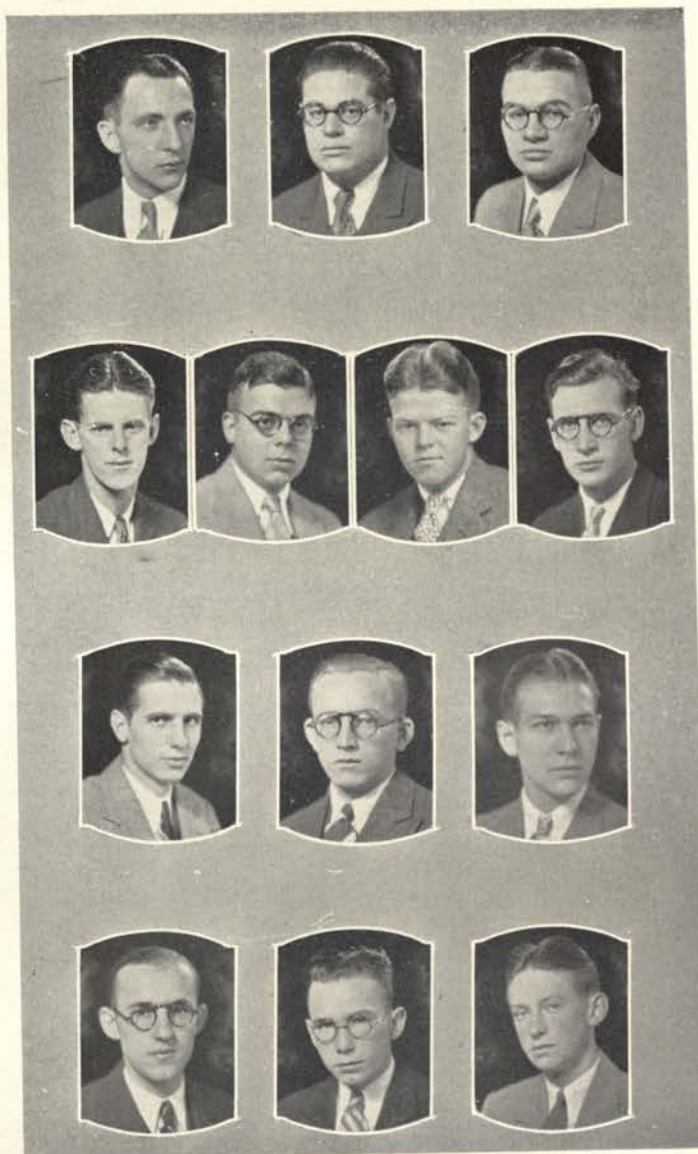


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Lambda Chi Alpha



*Founded at Boston University
Nov. 2, 1909*

*Alpha Delta Theta Chapter
Installed April 17, 1917*

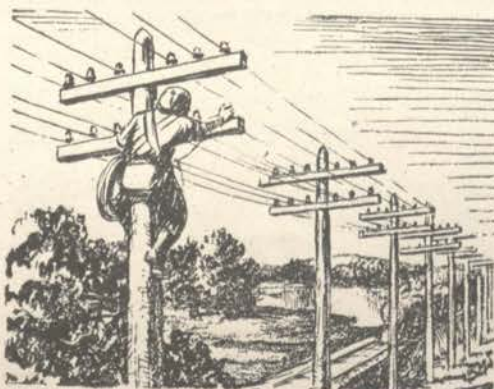
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Mercier Club



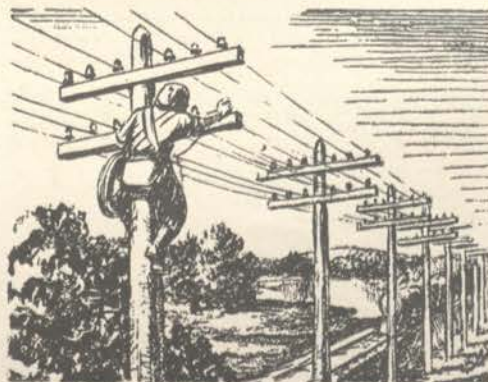
Founded 1925

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Triangle



*Founded April 15, 1927, at Uni-
versity of Illinois*

*Missouri Mines of Triangle Installed
December 10, 1927*

W. L. McCracken, *President*

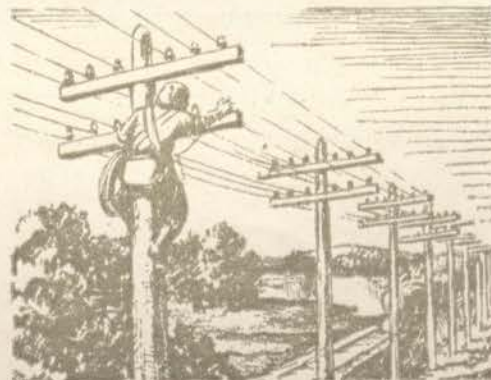
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J. Ulrey
E. Largent



Pipe Dreams

I

Didst ever in the even-time,
Take down your briar pipe,
Strike matches on your corduroys,
And on the amber bite?

II

Strange happenings fill the student mind,
As through the fumes of blue
A vision pleasant is aligned,
All garbed in roseate hue.

III

For living's worth the while, when each
Small worry drifts and curls
Up to the ceiling, out of reach,
And moulds your college-girl.

IV

The laughing eyes, the scarlet lips,
Take shape in contour fair,
Another puff, and there uplifts
A bank of curly hair.

V

She thus reclines on mystic couch,
And stretches forth her hand,
That fades within the lover's grasp,
Into a smoky band.

VI

She floats up high in hazy fume,
Beyond the touch of man,
And mocks the youth, predicts the doom
Of love in college-land.

VII

Up, always up, the Vision rides,
But ever out of reach,
The Maiden looks below and chides,
Of love that is impeached.

VIII

The sweet, fresh lips we fain would press,
Wait quivering on the air,

But soon dissolve—ethereal caress,
They're neither here nor there.

IX

They're gone to join all other lips,
That coax the heart they broke,
And are safe within the harbor
Of lost dreams, up in the smoke.

X

The youth unknowing still clings to
This immaterial wraith,
His head and heart are truest blue,
Unshaken is his faith.

XI

As pipes burn out, then so does love,
The former we relight;
But, ah, the Vision up above,
Has slipped into the night.

XII

To-night will never come again,
Though other pipes may glow,
And waft a picture now and then,
As up the smoke-wreaths go.

XIII

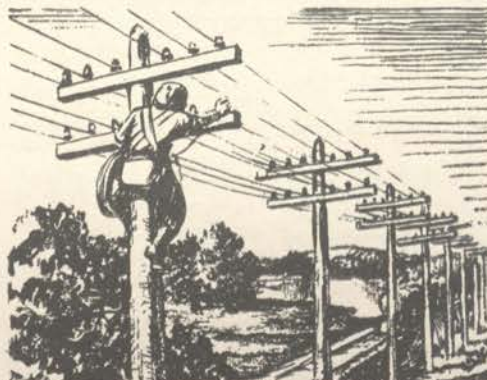
So kindle up, old briar friend,
Let's dream once more, be fast,
Before the Girl on high descends,
Let this dream be our last.

XIV

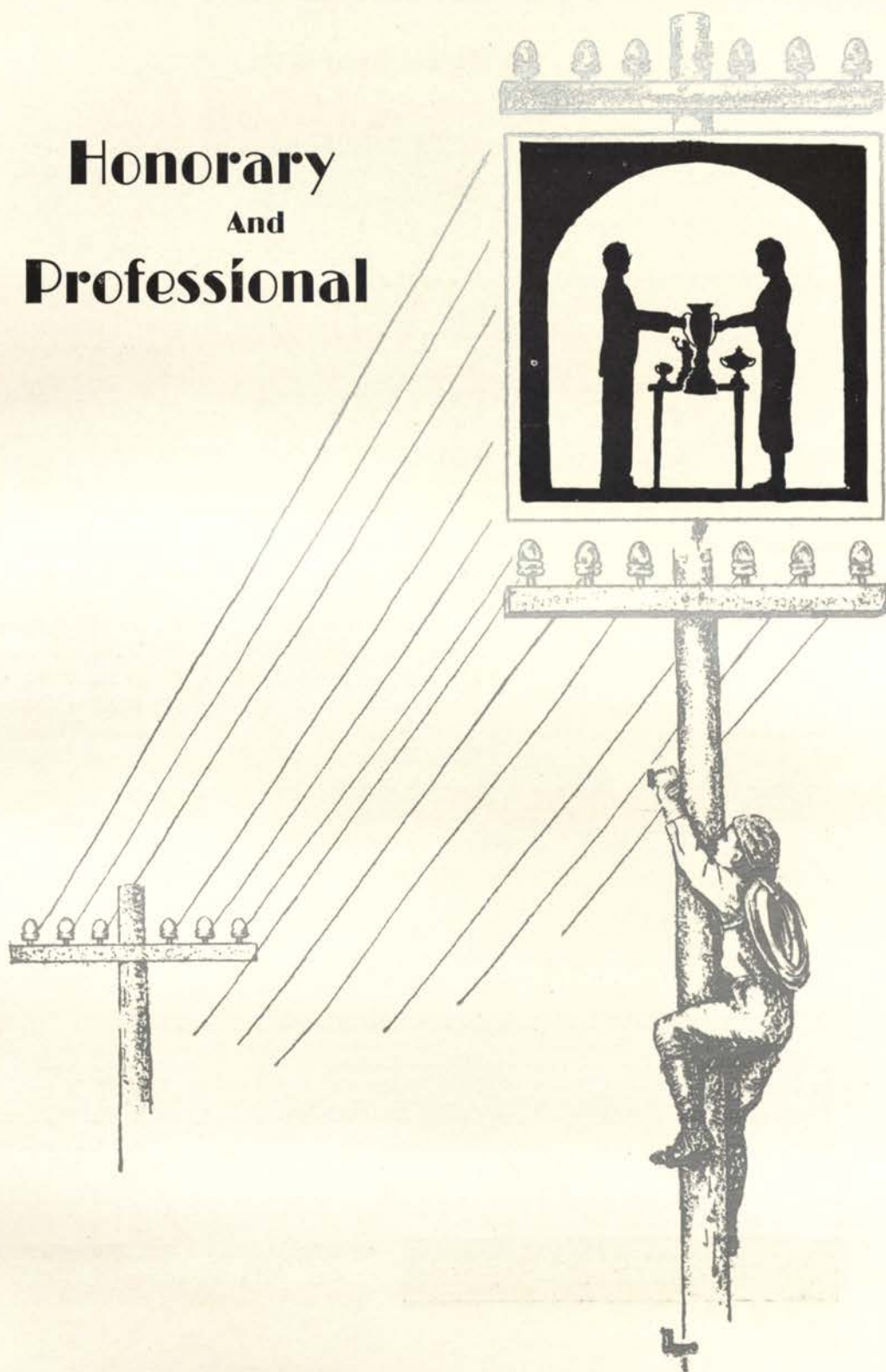
A few more puffs and all is done,
The gurgle sounds within
Our trusty pipe, the race is run,
The smoke is getting thin.

XV

Alas, the bowl no longer glows,
There but remains the ash,
The fragrant weed is dead, and so
Is college-love so rash.



Honorary
And
Professional



Phi Kappa Phi



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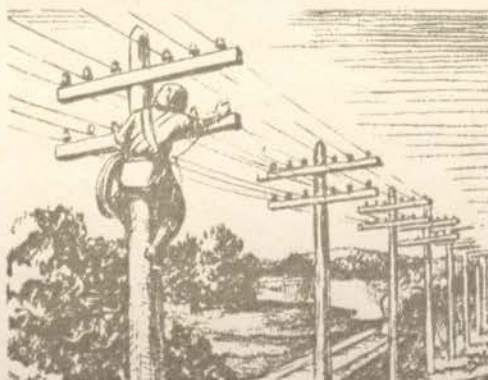
H. C. Beckman

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Tau Beta Pi

Founded 1885

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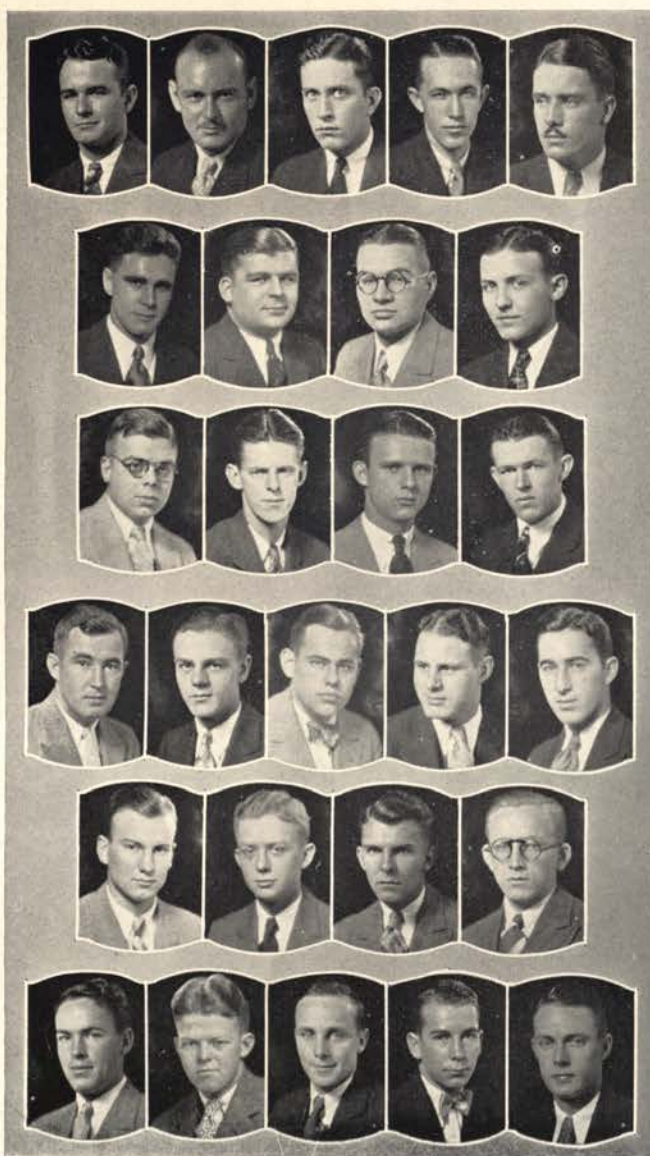
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 H. L. Wolfe

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 B. R. Elliott
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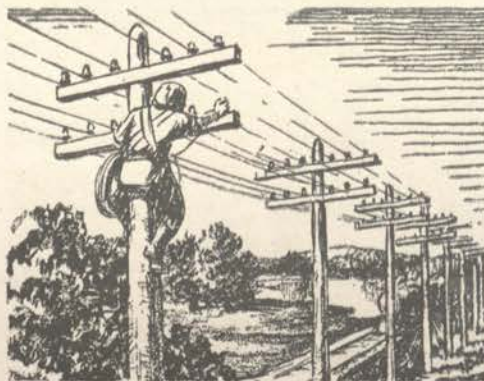


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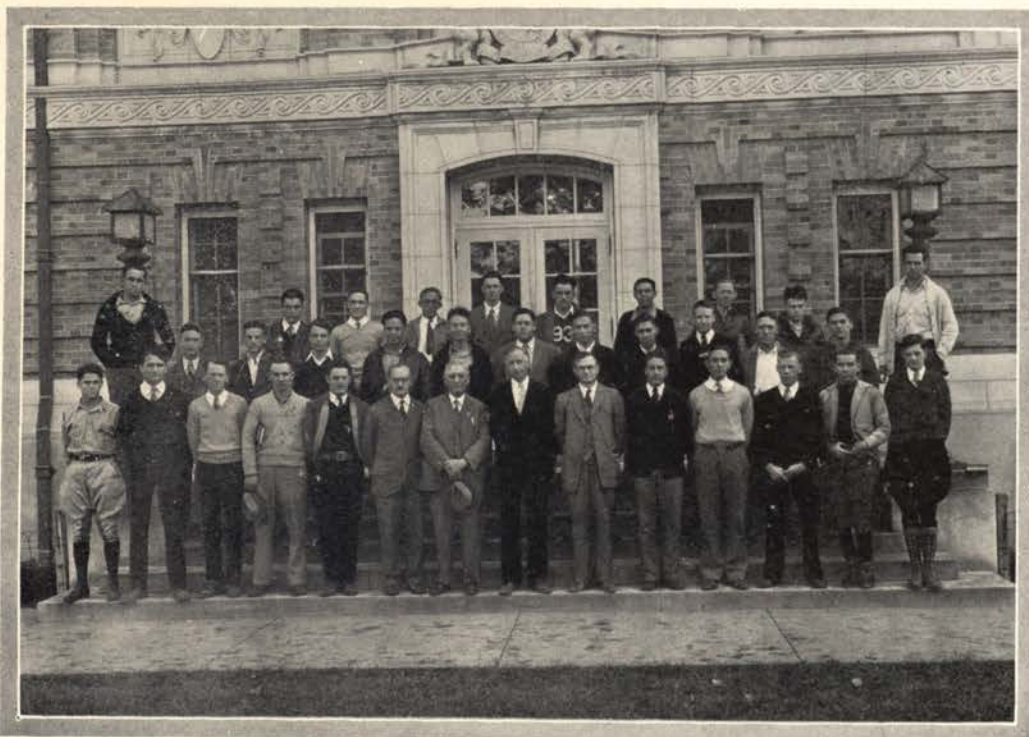
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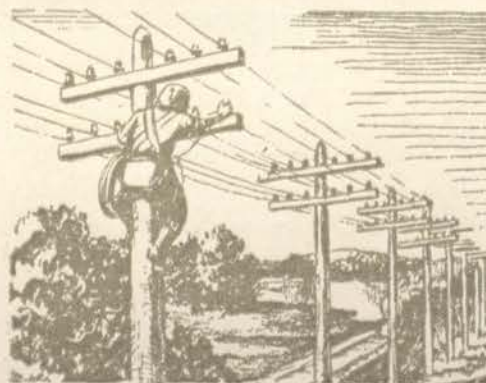
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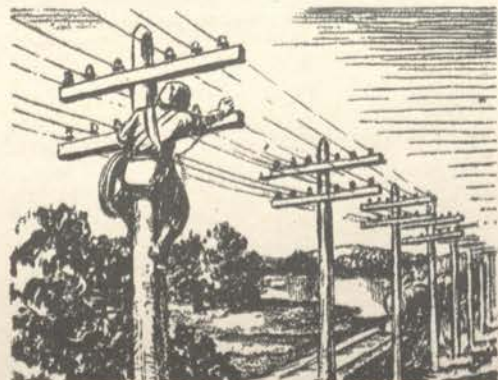
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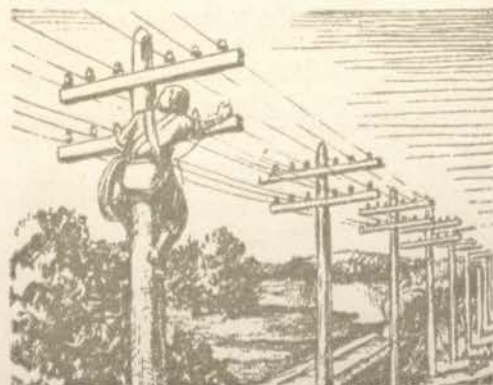
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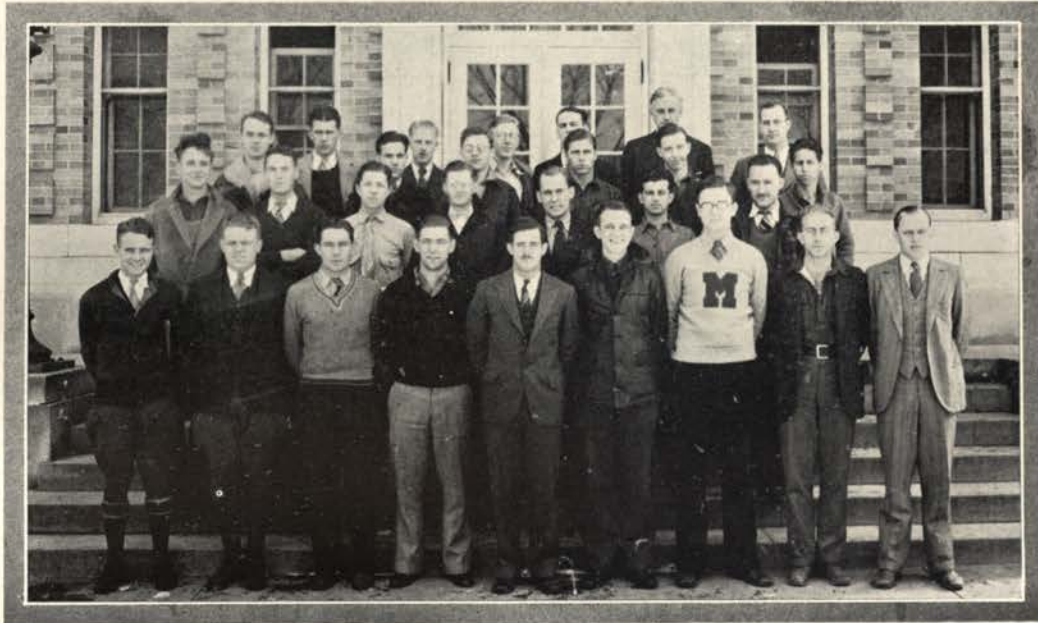
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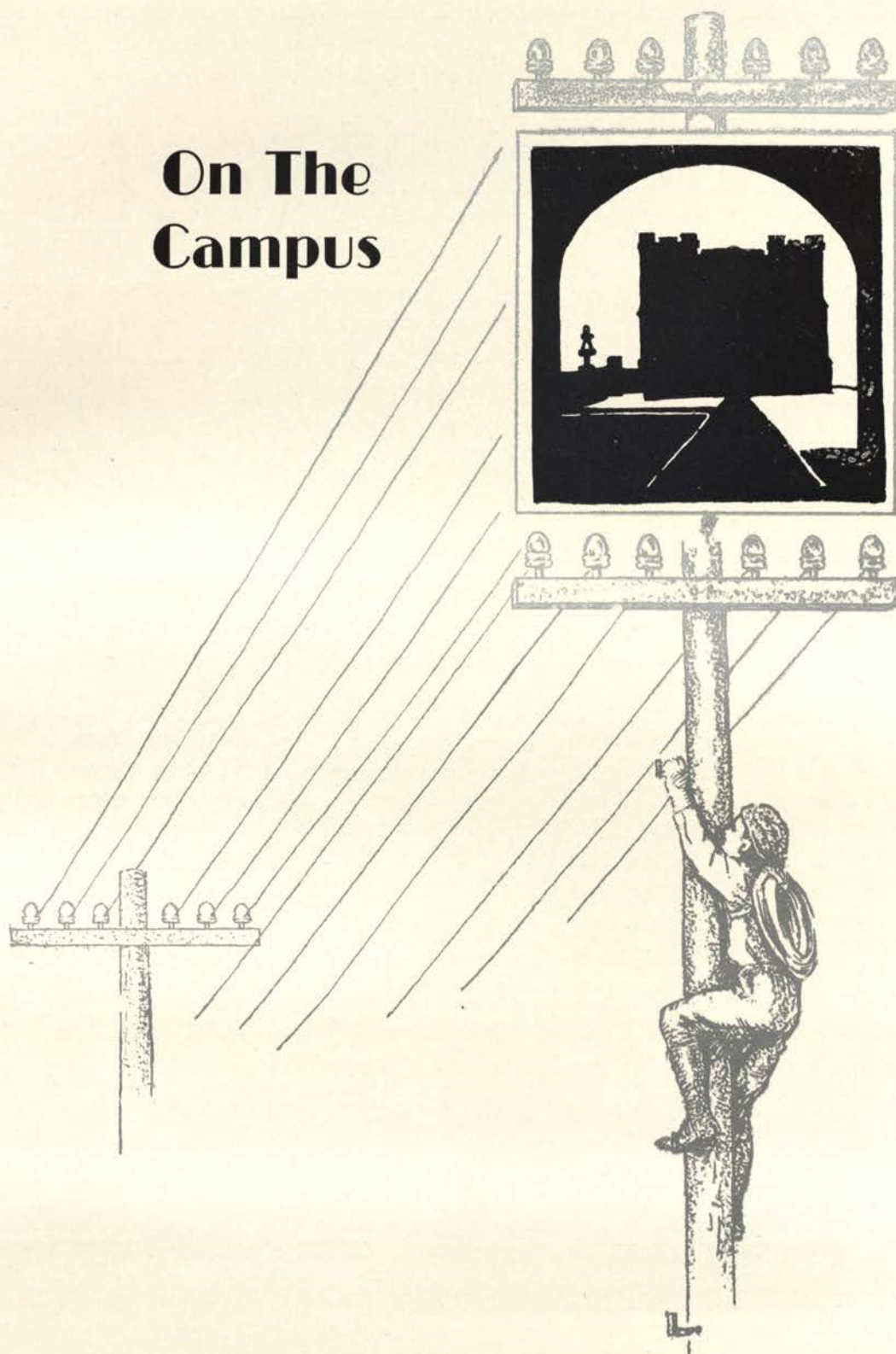
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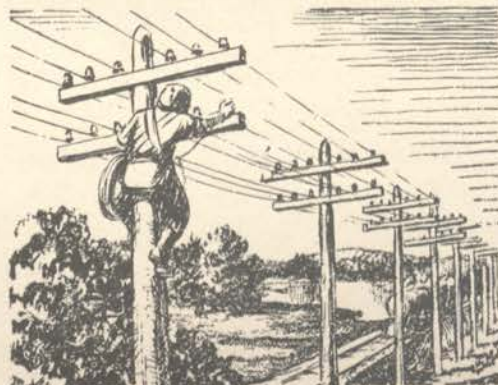
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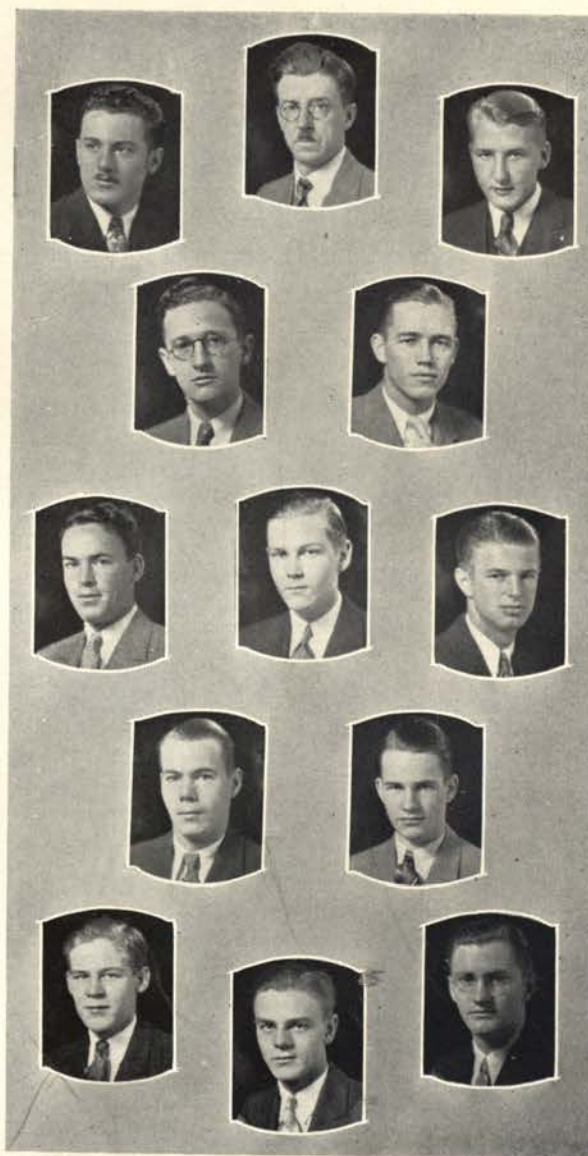
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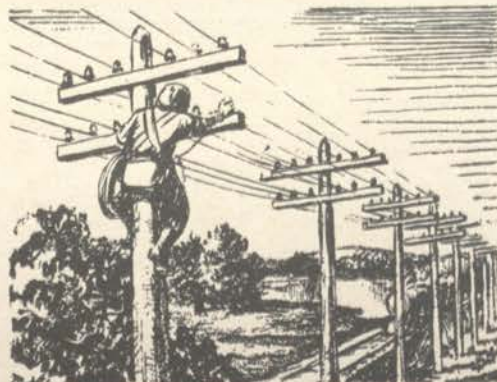
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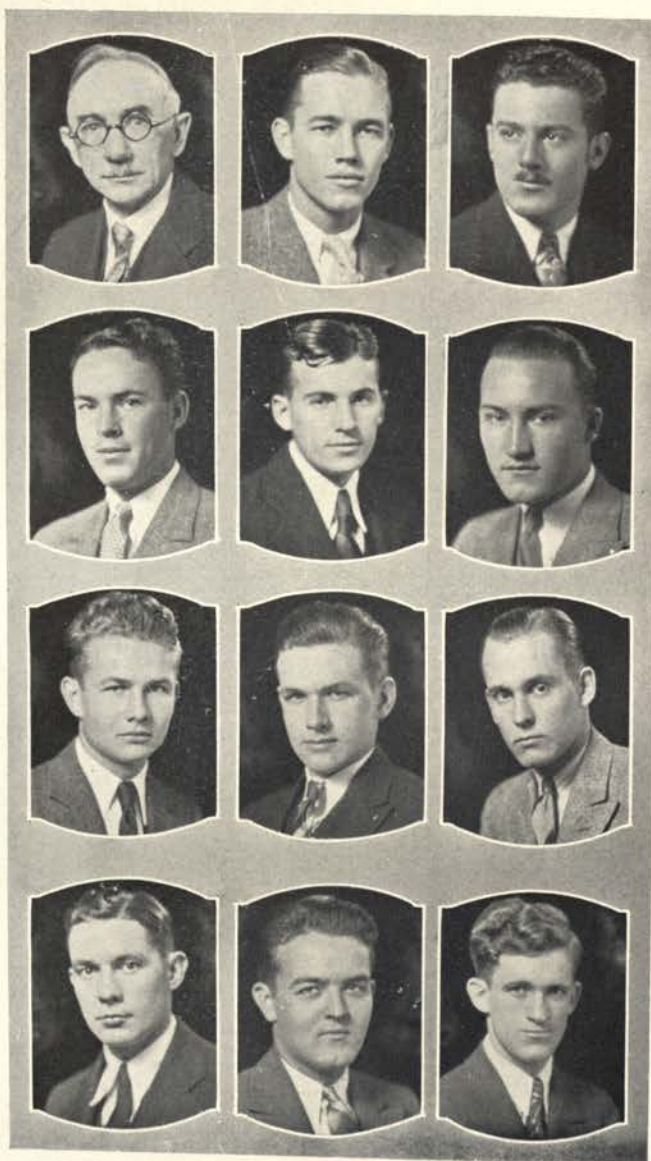
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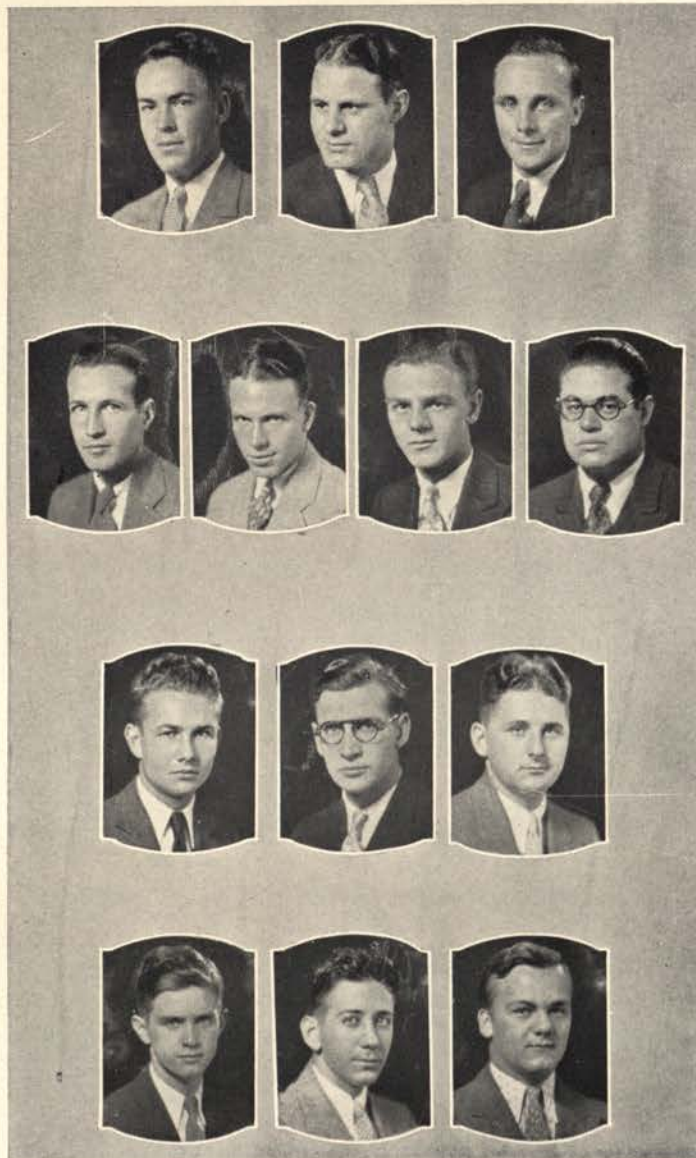
It is entirely a student publication and is frequently the field of more or less heated discussions among the writing Miners. The policy of the staff is to be impartial to every group or individual on the campus and we can say with all sincerity that the 1930-'31 board lived up to its avowed aim.

During the year on special occasions such as Christmas and St. Pat's our little sheet blossoms out in a fancy colored binding and contains all the latest jokes and pictures which, just as a comic magazine, adds so much to the enjoyment of the reader.



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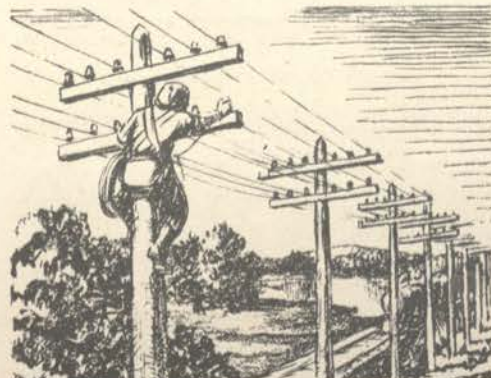
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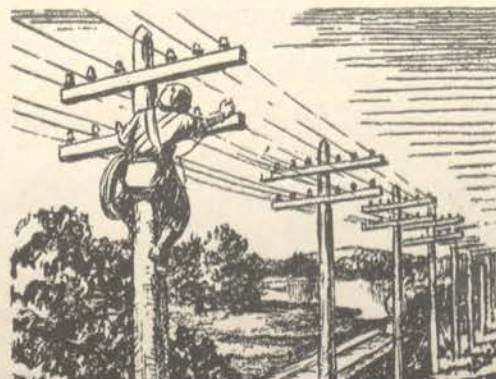
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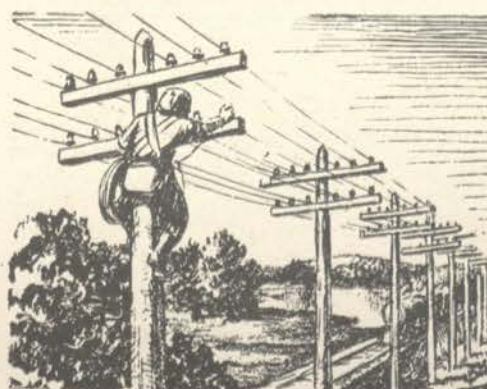
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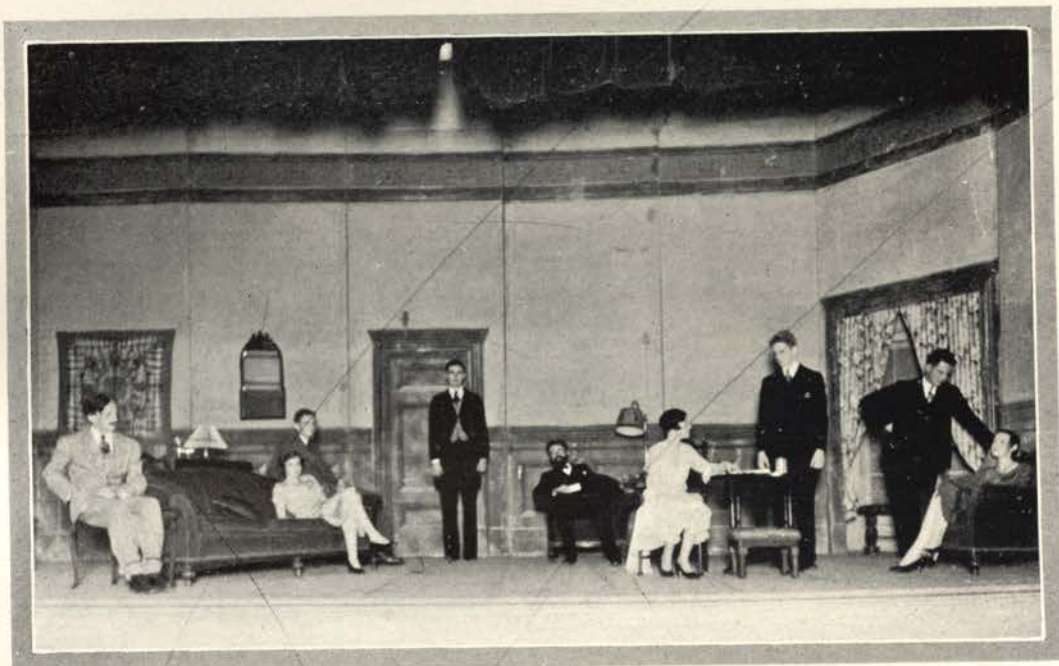
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M. S. M. Players



The M. S. M. Players is the student dramatic organization in which membership is entirely on a competition basis. It produces two plays each year, one in the fall as a number on the general lecture series and one in the spring as part of St. Pat's celebration. The St. Pat's play is also shown as a part of the general lecture series.

Membership is open to all students and faculty members and lady residents of Rolla who have successfully acted parts in two plays or worked on the business staff of three plays.

The officers and members in 1930-31 are:

L. A. WILSON.....	President
R. RYDSTROM.....	Business Manager

Students: R. F. Campbell, J. T. M. Smith, T. Boyer.

Non-Students: Elizabeth Long, Leola Faudree Millar.



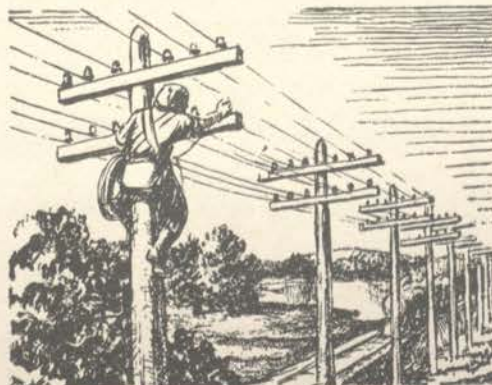
M. S. M. Varsity Orchestra

One of the greatest needs of a moderate-sized college community such as Rolla is a good dance orchestra which is available for all fraternity dances and popular campus social affairs. Without an organization of high spirited and talented producers of syncopation, the success of any dance remains a doubtful quantity. Mediocrity or indifference in a college dance orchestra are indisputably discouraging and invariably generate a feeling of dissatisfaction in the student body.

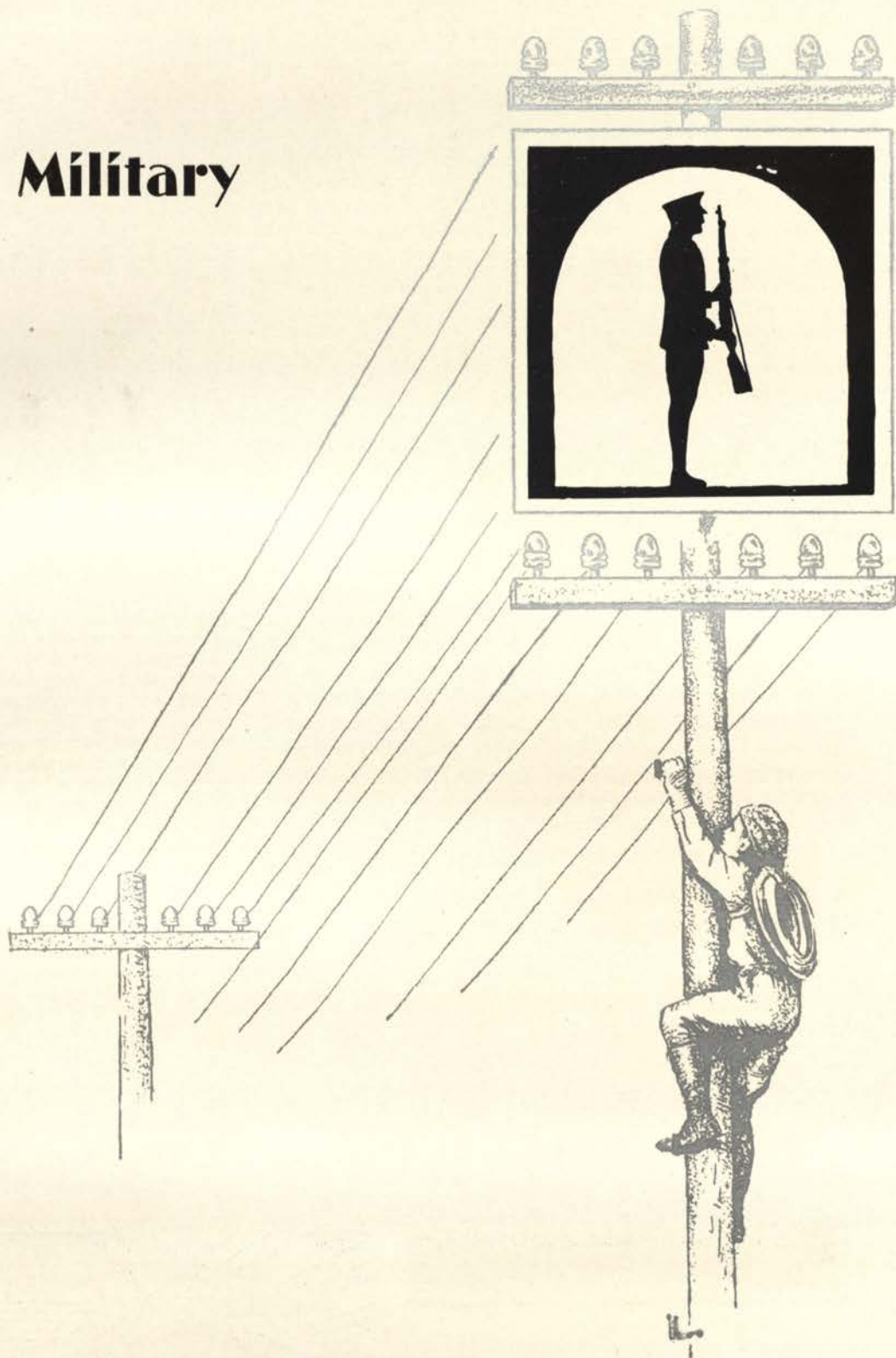
Such was the situation at M. S. M. in the fall of 1929 when L. E. Reeve gathered together a few students who possessed musical ability and began the task of producing a good dance orchestra capable of the harmony spirit which goes so far toward making a successful dance. That he succeeded admirably is evidenced by the popularity which the M. S. M. Varsity Orchestra, otherwise known as Reeve's Varsity Orchestra, has achieved. It stands unrivaled excepting Bill Schweikhardt's famous "Dutch Band" among all the harmony organizations which have been formed previously from the students of the school.

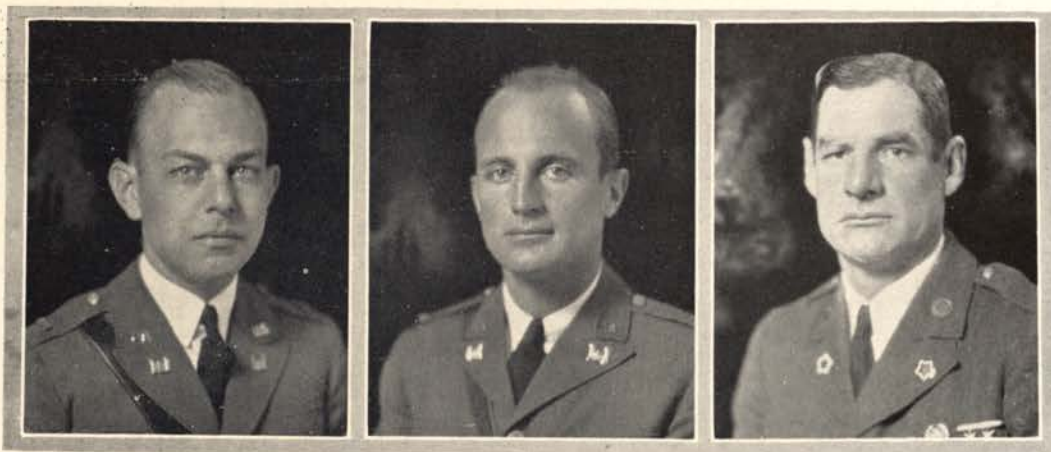
During the past two seasons Reeves' Orchestra has furnished the music for all fraternity dances and most of the campus social affairs where the services of a good organization of rhythm-makers was required. Invariably their performances added to enjoyment of the guests and the success of the occasion.

—W. I. H.



Military

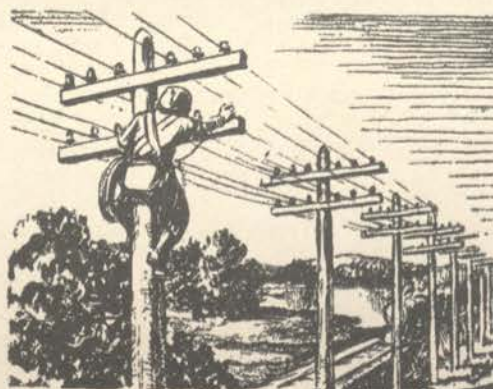




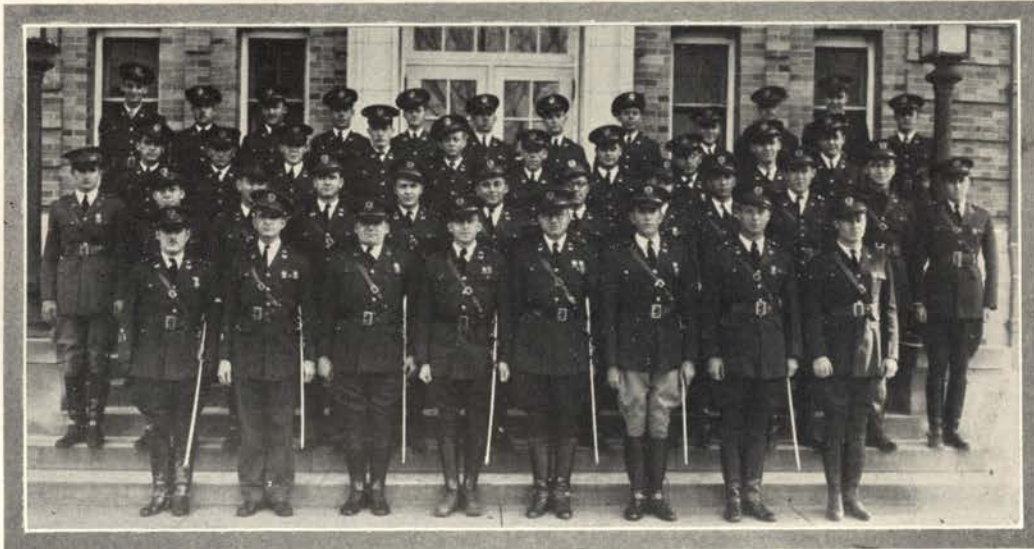
First Lieutenant John Ray Hardin, Corps of Engineers, U. S. A., went directly from the public schools of Baltimore to the United States Military Academy at West Point from which he was graduated on November 1, 1918. He attended the Massachusetts Institute of Technology at Cambridge and received his B. S. in Civil Engineering there in 1921. Lt. Hardin graduated from the Engineer School at Fort Humphreys, Va., in 1930 and was assigned to the School of Mines as Professor of Military Science and Tactics last September.

First Lieutenant William R. Winslow, Corps of Engineers, U. S. A., was graduated from the United States Military Academy at West Point in 1923. After several tours of duty in the U. S., he was stationed in Honolulu. Leaving there, he attended the University of Southern California and received his M. S. in Civil Engineering in 1927. He was Assistant P. M. S. & T. at the State College of Washington in Pullman and was appointed Assistant Professor of Military Science and Tactics at M. S. M. in 1928.

Sergeant William B. Bertram, D. E. M. L., U. S. Corps of Engineers, was graduated from the University of Virginia with the degree of LL. D. in 1911 and received a similar degree from Cumberland University in 1912. He enlisted May 3, 1917 and served overseas for two years in the 51st Field Artillery where he was promoted to the rank of sergeant. He remained with his unit upon its arrival home and later transferred to the 2nd Engineers; was stationed at Fort Sam Houston, Texas, and at Ford Logan, Colorado. Sgt. Bertram was assigned to the Missouri School of Mines in January, 1929, as an Instructor in Military Science and Tactics.



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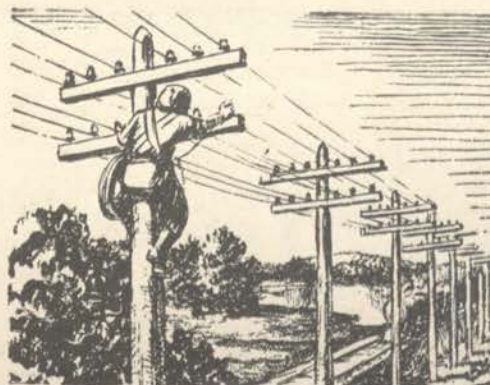
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Cadet Guide.....D. T. GIBSON
Cadet Corporal, A. J. Jones.
Cadets: J. L. Fox, E. P. Baumann, T. S. Donahue,
C. A. Gladson, E. Logan, L. S. Rolufs, J. O.
Ferrell.
Cadet Corporal, J. P. McNutt.
Cadets: D. W. Darby, F. N. Goodrich, E. Kirchoff,
O. S. Wenger, J. C. Berkenbach, D. Hanby, R. D.
Taylor.
Cadet Corporal, P. B. Prough.
Cadets: C. H. Beardsley, L. Bolon, D. P. Hale,
J. D. Anderson, C. E. Powell, F. L. Follet.
Cadet Corporal, J. Yarber.
Cadets: E. E. Schofield, W. S. Schamel, T. W.
Hunt, M. Edgar, W. D. Wells.

SECOND PLATOON

Cadet First Lieutenant.....AL TIEFENBRUN
Cadet Staff Sergeant.....F. WILSON
Cadet Sergeant.....E. O. CRAWFORD
Cadet Guide.....H. L. NICHOLSON
Cadet Corporal, F. Lowney.
Cadets: W. Skelton, U. T. Linkheil, E. Hackett,
N. A. Schmidt, H. Fererow, J. C. Maechem,
K. D. Cox.
Cadet Corporal, J. Messersmith.
Cadets: C. Kew, W. F. Berry, F. D. Burt, W. R.
Braddus, A. S. Groves, R. R. Levy.
Cadet Corporal, M. G. Handy.
Cadets: F. A. MacConnell, R. H. Buck, E. W.
McClure, W. B. Fletcher, B. W. Brown.
Cadet Corporal, J. T. Bratton.
Cadets: W. R. Powers, S. Levy, E. C. Gruetzer-
macher, F. A. Click, A. F. Peterson.



COMPANY B

Cadet Captain J. E. SCALLY
Cadet Second Lieutenant R. R. GAST
Cadet First Sergeant L. K. JOHNSON
Cadet Guidon Carrier C. R. ROSENBAUM

FIRST PLATOON

Cadet First Lieutenant M. G. TIEMAN
Cadet Staff Sergeant A. J. HOEMAN
Cadet Sergeant H. T. PAJERSKI
Cadet Guide V. L. ASHER
Cadet Corporal, D. M. Potter
Cadets: J. H. Crawford, G. A. Cavis, G. N. Hackman, L. F. Wildberger, R. D. Sandoe, R. C. Bransetter, T. Royer.
Cadet Corporal, J. N. Mavronicles.
Cadets: A. H. Zell, T. E. Smelser, E. D. Stolle, M. Bubas, M. F. Lageman, W. C. Bay.
Cadet Corporal, J. H. McKinley.
Cadets: E. C. Kozeny, J. W. Thompson, R. I. Brasenle, R. G. Thompson, M. B. Larwood, J. W. Darling.
Cadet Corporal, R. L. Brautigam.
Cadets: W. J. Dickson, P. C. MacDonald, R. A. Hubbard, V. I. Dodson, D. O. Watson.

SECOND PLATOON

Cadet First Lieutenant W. F. MAKIN
Cadet Staff Sergeant V. L. KLESATH
Cadet Sergeant J. A. CARTLEDGE
Cadet Guide L. J. TOWNER
Cadet Corporal, F. M. Warren.
Cadets: F. N. Durbin, H. F. Blount, G. H. Musson, K. R. Krummenacker, H. B. Haddock, R. L. Cummins, L. Stanton.
Cadet Corporal, H. W. Short.
Cadets: W. N. Coffman, J. M. Londe, F. A. Crippen, F. Fraulini, B. H. Penwarden, F. W. Klee, T. O. Greene.
Cadet Corporal, J. Wilhite.
Cadets: P. A. Badame, R. W. Borchers, A. Pollack, C. C. Rodd, A. J. Boles, E. E. Fagan, E. A. Wotawa.
Cadet Corporal, P. Cei.
Cadets: E. R. Largent, J. J. Beinlich, W. Berry, F. H. Kister, G. Forsgren.

COMPANY C

Cadet Captain A. R. BARON
Cadet Second Lieutenant P. J. PICCO
Cadet First Sergeant A. S. MACKE
Cadet Sergeant H. G. HEDGES
Cadet Guidon Carrier M. R. EDGAR

FIRST PLATOON

Cadet First Lieutenant L. A. WILSON
Cadet Staff Sergeant W. T. KAY
Cadet Sergeant O. K. LAY
Cadet Guide
Cadet Corporal, R. S. Green.
Cadets: W. F. Smith, M. F. Chichowski, E. R. Mertz, J. B. Ulrey, R. C. Montgomery, R. A. Tieman, W. E. Hedges
Cadet Corporal, A. E. Shrubbsall.
Cadets: L. A. Cardosy, W. O. Brewster, J. M. Haskins, H. Hales, C. Denton, C. A. Williams, H. P. Gillespie.
Cadet Corporal, F. R. Davidson.
Cadets: F. S. Nazic, H. S. Hultz, H. T. Ford, H. R. Abshier, C. J. Thorpe, C. P. Frebrache, M. Wilson.
Cadet Corporal, A. W. Beinlich.
Cadets: C. Seegall, S. M. Manuel, C. P. Keller, F. M. Lands, M. S. Mathes.

SECOND PLATOON

Cadet First Lieutenant W. L. MCCracken
Cadet Staff Sergeant F. M. THOROUGHMAN
Cadet Sergeant J. S. PUTNAM
Cadet Guide
Cadet Corporal, R. E. Crawford.
Cadets: H. C. Thelenius, R. W. Simpson, C. H. Schmitz, W. H. Brown, B. C. Kauffman, W. J. Erwin, P. G. Wild.
Cadet Corporal, J. D. Martin.
Cadets: L. J. Sullentrup, A. E. Koch, T. O. Seiberling, B. C. Goedde, E. E. Kracht, J. Czysewski, W. H. Crow.
Cadet Corporal, W. H. Lambur.
Cadets: W. A. Brown, C. R. Strang, J. R. Armstrong, A. E. Dailey, K. H. Sievers, E. S. Maehl, G. J. Murphy.
Cadet Corporal, A. H. Hesse.
Cadets: O. V. Dreyer, W. R. Moore, J. C. Garst, J. Parker, C. S. Marxer.



COMPANY D

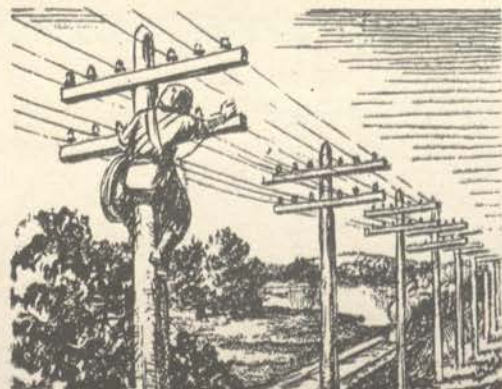
Cadet Captain W. B. SCHOFIELD
Cadet First Sergeant R. F. MONROE
Cadet Guidon Carrier S. W. MORRIS

FIRST PLATOON

Cadet First Lieutenant B. A. BARNES
Cadet Staff Sergeant K. A. ELSEA
Cadet Sergeant R. L. LARKIN
Cadet Guide B. GROSS
Cadet Corporal, J. J. Picco.
Cadets: G. A. Hale, C. R. Maise, S. W. Phillips,
G. M. Schwartz, L. E. Poese, J. W. Magilo,
C. R. Trotter.
Cadet Corporal, R. H. Latham.
Cadets: G. H. Carpenter, E. A. Huffman, R. A.
Parker, I. C. Spotti, P. E. Kabrick, W. A. Un-
sicker, A. H. Walter.
Cadet Corporal, R. J. Groom.
Cadets: R. A. Sackewitz, N. J. Klinger, H. H.
Lewis, W. C. Maloney; R. C. Weigle, C. E.
Musick, R. L. Stone.
Cadet Corporal, R. W. Richmond.
Cadets: D. A. Ford, W. D. Gelmacher, E. W.
Geiseke, H. O. Hendrickson, P. A. Abbott.

SECOND PLATOON

Cadet Second Lieutenant M. F. MURPHY
Cadet Staff Sergeant A. S. SCHWARTZ
Cadet Sergeant H. R. THORNTON
Cadet Guide H. W. KRATLY
Cadet Corporal, W. N. Dennick.
Cadets: J. G. Burnham, T. V. Cummins, H. A.
Hoffman, H. H. Hahn, K. J. Stedlin, B. K.
Miller, R. J. Scafe.
Cadet Corporal, R. E. Pinkley.
Cadets: J. B. Hinchman, W. W. Carpenter, W. H.
Russler, R. W. Grace, G. O. Cross, G. M.
Guthrie, W. J. Campbell.
Cadet Corporal, G. Heiligman
Cadets: G. H. Fletcher, J. O. Hall, A. R. Oswald,
H. S. Hickman, J. R. Wagner, W. F. Berry.
Cadet Corporal, W. M. Rodgers.
Cadets: F. Joslin, P. T. McCoughan, H. W. Lenox,
M. W. Lischer, I. G. Tanner.



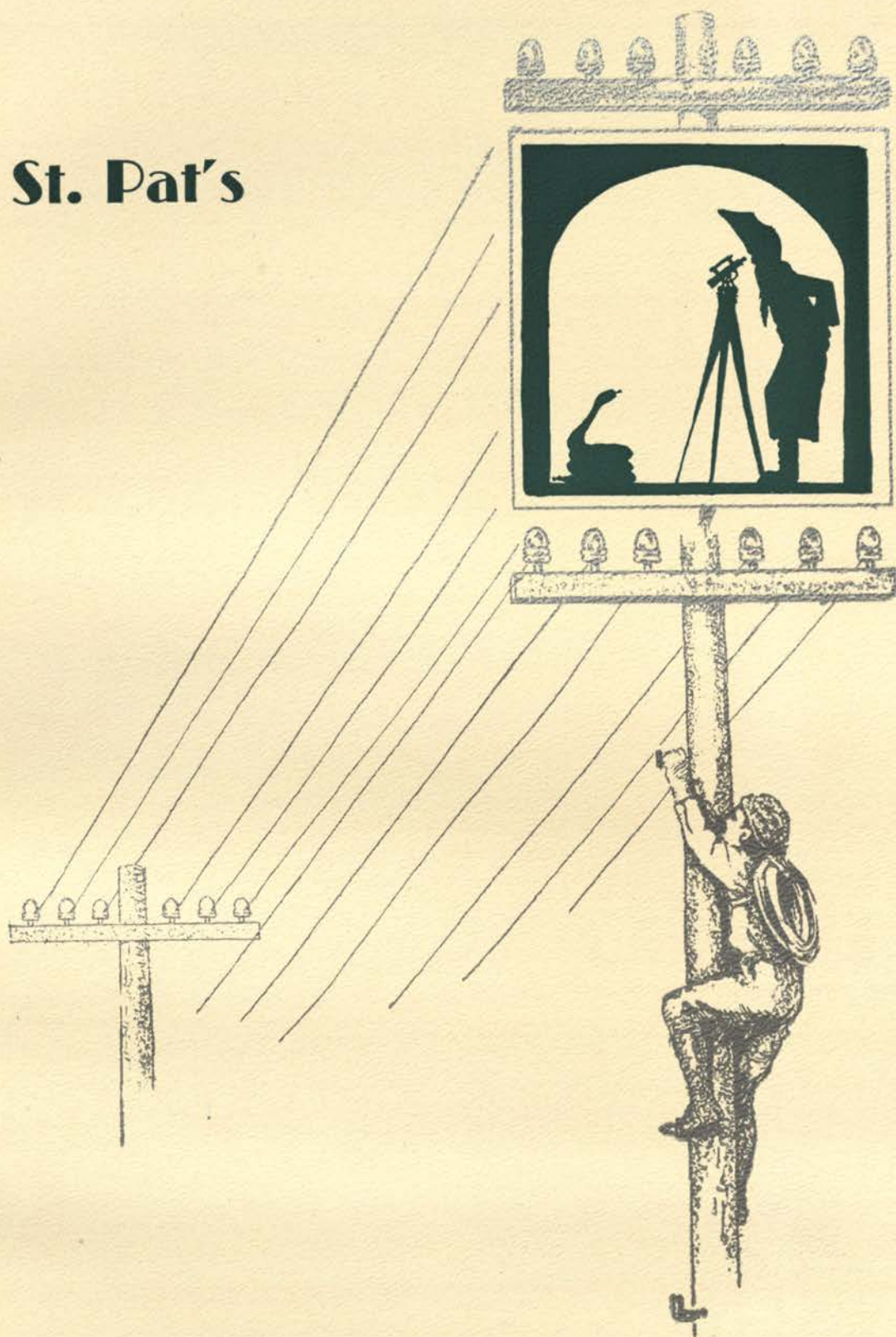


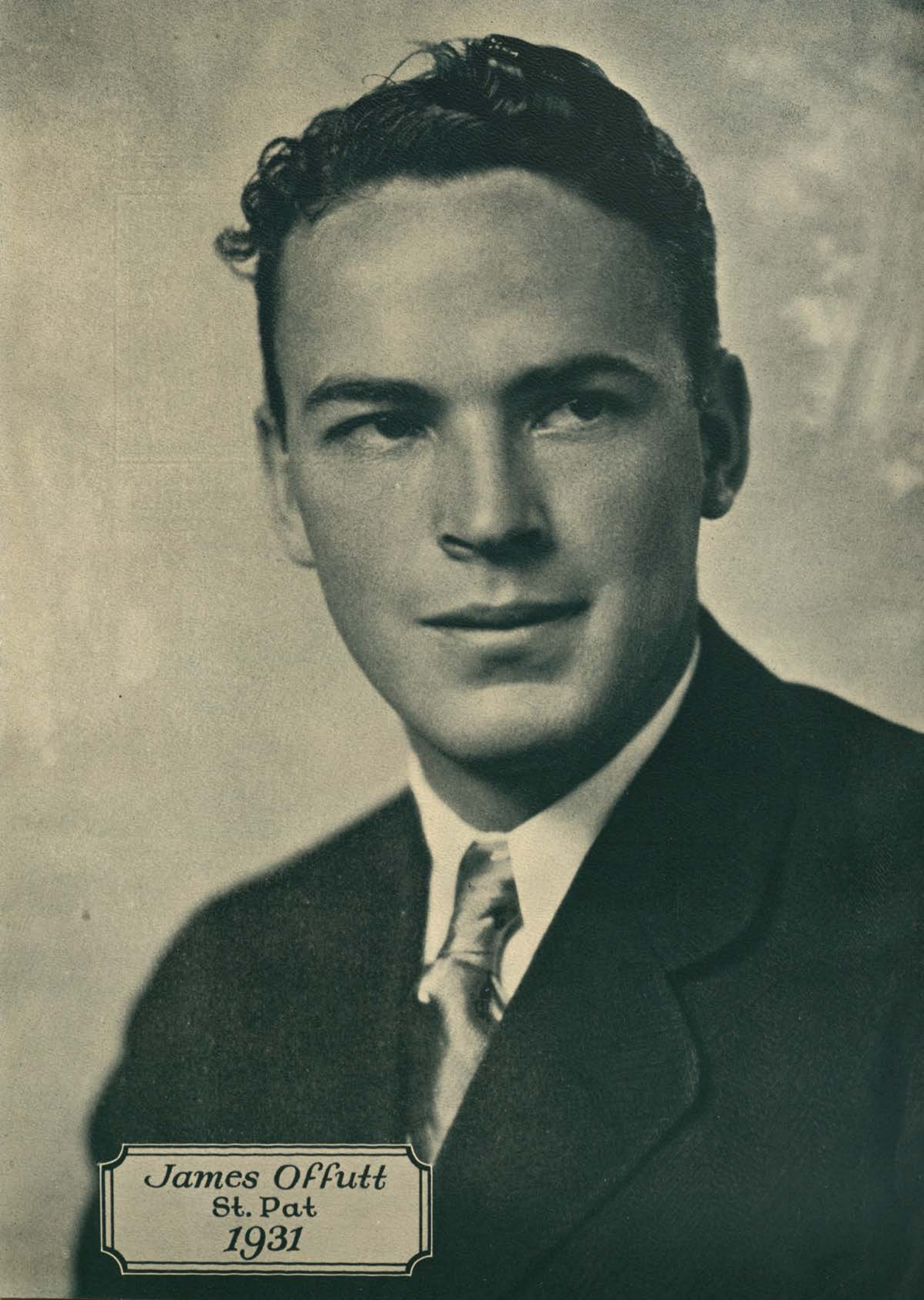
Features

Improvements were made on the switching equipment so that the early, clumsy, manual boards were replaced by efficient manual boards and finally by the automatic exchanges operated by the dial telephone. Improvements in design were carried through to the hand set, the latest type of instrument developed.



St. Pat's





James Offutt
St. Pat
1931



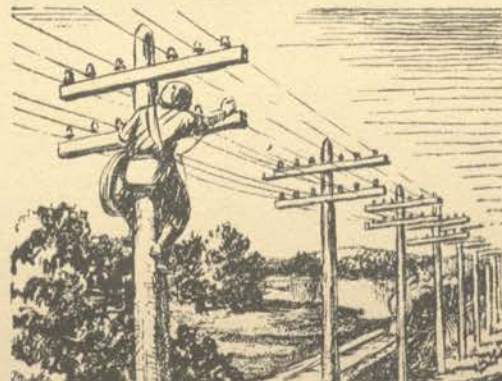
Marion McKinley
St. Pat's Queen
1931

St. Pat's 1931

To whatever part of this old world of ours the loyal sons of M. S. M. have strayed, there too have gone the age-old traditions of St. Patrick, beloved patron saint of all engineers. That the grand old man of engineering is well entitled to the honor and fame which are his is well attested by the history of his prodigious deeds, foremost among which was the banishment of all evils in the form of snakes from his own Emerald Isle, thereby converting it to a Christian land of good cheer. One brandishment of his trusty shilalah, a warning shout, "Be off wid yez, ye varmintsn lessen I use yer skins to bind me books!", and the snakes and all forms of evil were banished forever. Many other equally heroic deeds too lengthy and too numerous for inclusion in a narrative of a St. Pat's celebration are attributed to the wondrous powers of the old gentleman. Suffice it to say that he is revered among all the loyal sons of M. S. M. and that we are so extremely fortunate as to possess his affection so that he visits Rolla yearly on March 17th. For this happy event three days are set aside and the entire student body engages in the celebration with such whole-heartedness that St. Pat's at Rolla has become far-famed, the big splash in our social puddle.

This year, as usual, the gods of the upper spaces, in joyful anticipation of the spectacle of the arrival of that venerable old bard at Rolla, mixed the drinks a bit indiscreetly it seems, and the weather controls were handled with alarming carelessness resulting in rain during the greater part of the entire celebration. But nothing can make a Miner downhearted during this incomparable social event. There are compensations. The joy occasioned by the jolly army of feminine joy-seekers which invades the village to help celebrate St. Pat's may not be mitigated by so commonplace an occurrence as rain.

Throughout the years of happy St. Pat's celebration which have passed into history, it has gradually become the custom of the various fraternities and club houses on the campus to stage a brilliant series of house-parties and open-house dances as a prelude to that which follows during the week-end. Equally brilliant and thrilling were the joyable dances held Thursday evening, March 19th, to any that had gone before.



Starting at 8 o'clock in the evening the parties succeeded each other in delightful rotation until the last one ended at breakfast time with bacon and eggs very appropriately served. Needless to describe the mixture of happy anticipation and joviality that attended each of these dances.

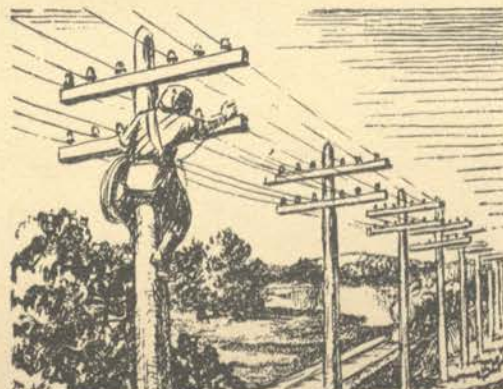
Out of the dimness of a year's sojourn in foreign lands and thru the mists of a dripping morning came Saint Patrick. Disembarking from his hand-car at the "Union Station" he placed himself at the head of his bodyguard of inimitable QV kids and a parade composed of floats from fraternities, clubs, and merchants. Marching blithely to the music of the R. O. T. C. Band the procession soon reached Parker Hall where the venerable old Saint arrayed himself upon the stage of the auditorium with his retinue of guards and pages and delivered a most worthy address to the assembled body of guests, faculty, students, and townspeople. Welcome to the fair damsels who were guests, greetings to all men, and admonition to the faculty and seniors were the content of his witty oration. Immediately following this annual message he officiated in the knighting ceremony. Each senior aspirant to the honor of knighthood in the order of St. Pat was presented with a sheepskin and royal emblem after having been reprimanded for past deeds and commanded to kiss the Blarney Stone reverently by the fatherly Saint.

In the afternoon the multitude of joy-seeking couples were once more attracted to Parker Hall to be entertained this time by the M. S. M. Players in an excellent three-act comedy farce, "Madam The Boss." A plot of political intrigue filled with funny situations abetted by a competent cast, it achieved great success and added much to that day among the three in which no dull moment is ever allowed to creep.

The realization of the dreams of many came that evening when the crowning feature of St. Pat's festivities—the Masque Ball—with all its incomparable joy, beauty, and splendor started, and midnight approached. In striking contrast to the gloom of that misty evening outside the gym was the atmosphere of the beautifully decorated interior of it. From the dance floor drifted the sweet slow rythm of a popular dance tune and, as one listened and approached its source its tempo seemed to increase until, reaching the Palace of Love and Beauty into which the main room had been transformed, one received the full effect of that never-to-be-forgotten scene. Never had a more wonderful



orchestra produced the all-important harmony; never a more colorful happy crowd of joy seekers than that which was gathered there in happy anticipation. Midnight struck, and close upon the echo of the last stroke came the clarion call of trumpets announcing the arrival of His Majesty St. Pat. The sounds of gayety and laughter of many happy couples faded as the pages announced the well-beloved Saint. Bent of figure and hoary of beard because of his many years, but no less imperious and commanding was he as he strode slowly toward the throne while the orchestra struck up his favorite ballad, "The Wearing of the Green." Kow Tow!, was the order now of every guard of St. Pat and, as the crowd knelt in obeisance, a procession of exceeding grace and beauty entered and passed down the aisle toward the throne. There came several former queens of St. Patrick; Mrs. H. G. S. Anderson, 1919; Miss Elizabeth Long, 1929, and the retiring queen, Miss Madge Lennox. Then, preceded by a long train of Maids of Honor and the little crown bearer and flower girls came the Queen of St. Pat's 1931, Miss Marion McKinley. Radiant in all the glory of her blonde loveliness she approached the throne with befitting grace and dignity amidst a tremendous ovation from the enthusiastic crowd. Kneeling before the venerable old Saint she was crowned by him and welcomed to preside over the festivities with him. Then followed a grand march led by Col. Chas. L. Woods in which the entire throng of sweethearts joined. This marked the end of the outstanding event of a wonderful evening of enjoyment. Came the recessional from the throne, and then—"on with the dance!" and Slatz Randall's Brunswick Recording Orchestra started willingly in the production of unending strains of captivating harmony that increased the pulses of many a happy couple. No description could possibly do justice to the costumes of the merry-makers and the decorations of the hall that evening. Impersonations of many characters varying from ladies of King Arthur's Court to Circassian Slave Girls and from Charles II to Daniel Boone were in no sense lacking. And through the whole crowd moved Dan Cupid and Youthful Glamour producing a magic wondrous to behold. Only the huge crystal ball, played upon by the rays of vari-colored light from many spotlights and throwing in return myriad gleams of dancing light upon the crowd below and into the far corners of the room to seek out every bit of happiness there could tell of all the beauty and bliss so rampant in the Palace of Love and Beauty that night. Too soon, it seemed, came the approach of dawn and the end of a perfect dance. Wearily but happily the joy-seekers sought the soothing arms of Morpheus as the stars on the eastern horizon began to dim with the approach of dawn.





The greater part of the next day was spent in recuperation and the early morning hours found Rolla a deserted village. But the elasticity of youth prevailed over fatigue and such complaints as sore feet and other minor ailments, and an inventory of the guests at noon disclosed all present and rapidly reviving in energy, disposition, and appetite. As the afternoon wore on and the open-house dances of the Kappa Alpha's and Sigma Nu's were attended all cares vanished and the same happy crowd moved on toward the enjoyment of the brilliant formal dinners at the various houses on the campus. Again happiness and the delightful excitement of anticipation held the guests. Ten o'clock saw them assembled again at the gym. But what a difference in their appearance. The Daniel Boone of the preceding night had changed magically into an immaculately groomed figure clad in the formal black and white. Upon his arm was seen not the

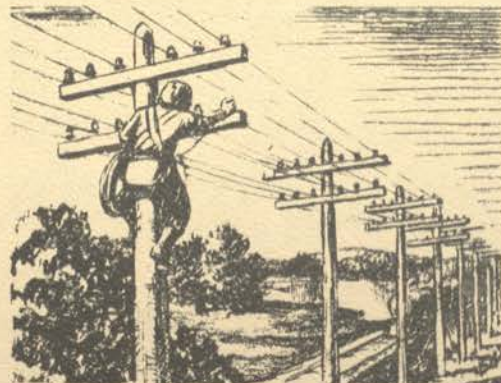


Circassian Dancer but a beautiful lady clad in a jeweled gown of dazzling splendor. It seemed that the contrast between the two nights served to satisfy any desire for variety that might have existed.

You may search where you will but never will you find a more jovial and yet supremely happy group of young people than at a college prom. Such was the spirit of the dancers, thrilled by music at its inspiring best and transported to a dreamland of happiness lasting thru the golden hours of that perfect Formal Ball. Perhaps it was the poignant feeling of regret at the closing of so wonderful a celebration that engendered their resolve to dance, sing, and love while so excellent an opportunity presented. Certainly a perfectly arranged repertoire of features by the orchestra aided. At any rate Cupid enjoyed a great night of business so that, after a perfect final dance number, the strains of a beloved familiar song sung by many baritone voices filled with emotion, caused many a heart to contract with an indescribable feeling of combined bliss and sorrow, as it reached the ears of the listeners—"I'm a Ramblin' Wreck from Rolla Tech, —a Mining Engineer."

Although the 1931 St. Pat's celebration ended with those final strains of music and the reluctant departure of the guests from the gym, it goes on unending in the memories of those who achieved unparalleled happiness here.

—Wesley I. Hartnagel.



Campus Views



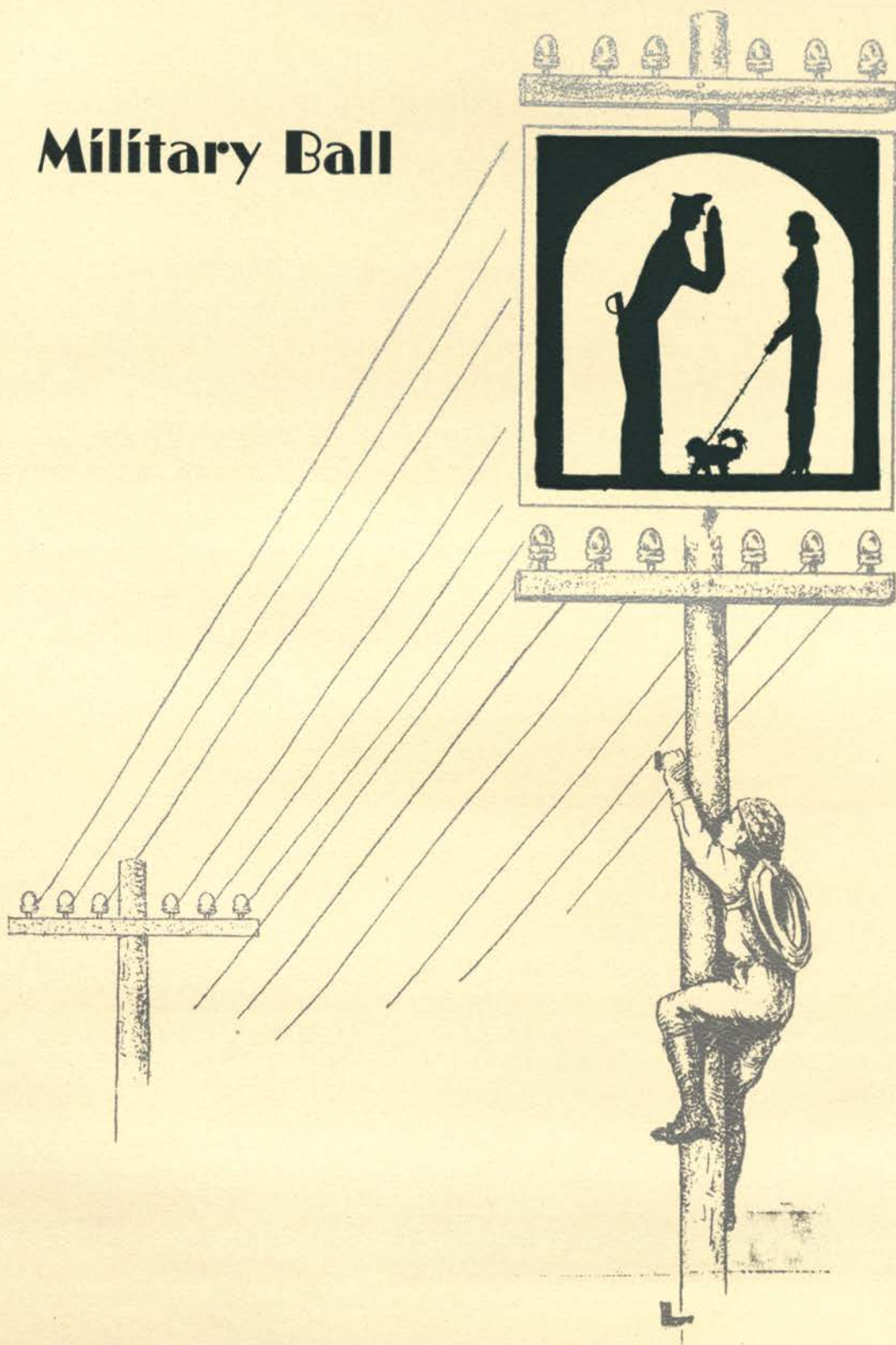






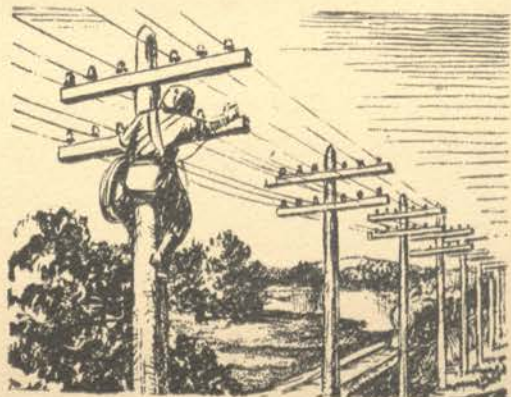


Military Ball

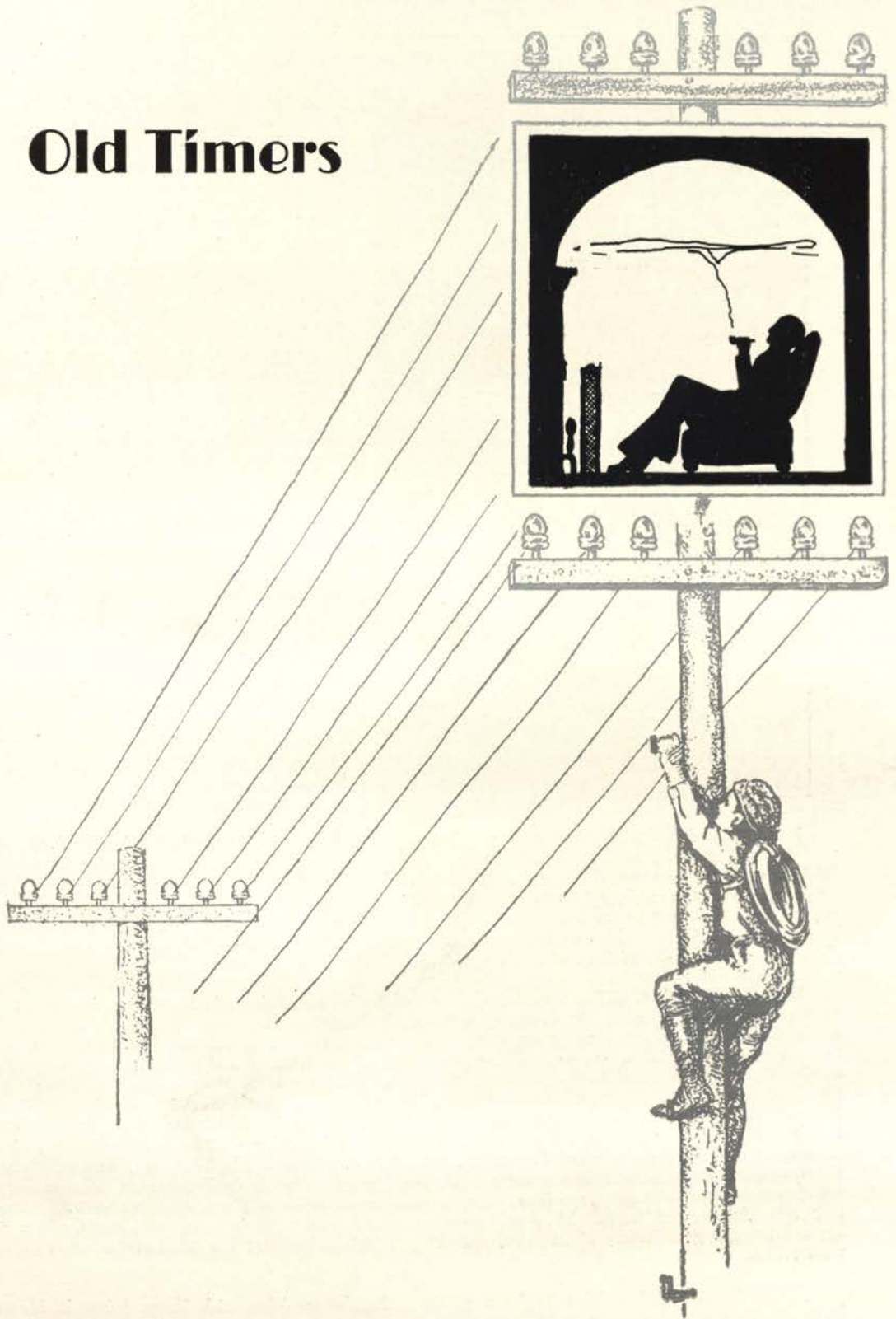


Military Ball

The Army went in for entertainment in a large way with their annual dinner-dance at the Pennant Terminal, February 28. About sixty couples (plus ten stags for enjoyment's sake) attended. The dinner promptly began forty minutes late and was soon over (not counting time out for service) at about nine o'clock. Everything was ripe for the dance to begin and Captain Reeve and his noise-makers in a half-hour had made things plenty hot for the dancers. Folks who came to the Terminal wondered at the profusion of military uniforms and especially were amazed when a few couples started dancing on the lower floor. But the excitement soon blew over, the orchestra got hotter than ever, in contrast to the temperature, and by midnight it was almost rivaling St. Pat's experiences, however army regulations require sleep for their would-be officers. Thus the "engineers" were turned out with the memories of how they would feel just three short weeks later looming up in their minds.



Old Timers





ENOCH R. NEEDLES received degree of Civil Engineering in 1920. While in school Mr. Needles was a member of Pi Kappa Alpha fraternity, Tau Beta Pi, Quo Vadis. Mr. Needles was also connected with the Rollamo Board, Student Council and was President of his class. Mr. Needles' first position was with the Kansas City Southern Railroad as draftsman. Subsequent positions are Kansas City Terminal Railroad, draftsman; Harrington, Howard and Ash, consulting bridge engineers. For the past three years Mr. Needles has been a partner with the firm of Ash, Howard, Needles and Tammer, consulting bridge engineers.

HORACE H. CLARK, '15, B. S. in Mine Engineering. Member of Lucky Strike Club. Immediately after graduation Mr. Clark secured a position as chemist with Corn Products Co. Subsequent positions were: Chemist People Gas Co., Manager Industrial Sales, Public Service Co., Vice-President United Public Service Co., Chicago. During the World War Mr. Clark was Deputy Fuel Administrator for Illinois. At present Mr. Clark is Vice-President of the firm of John Clark & Sons Investment Bankers, Wilmette, Illinois.

HENRY HARTZELL, '06 B. S. in Mine Engineering. Held position as chemist at Granby Mining & Smelting Co., later he was advanced to the position of Manager of Lead Smelters, Granby Co., after this he became Mine Superintendent for the same company. Following this Mr. Hartzell was employed as Manager of Huttig Lead & Zinc Co., Pitcher, Oklahoma. At present Mr. Hartzell is Mine Operator, Baxter Springs, Kansas.

RALPH ROBERT BENEDICT, '06, received Bachelor of Science degree in Mining Engineering; in 1916 he received a degree of Civil Engineering. While at school Mr. Benedict was connected with the Grubstackers Club and the Y. M. C. A. Immediately after graduation Mr. Benedict acted as Chief Inspector of Construction, later he was employed as Engineer, Active Executive Officer, Assistant Superintendent, and with the War Department. Mr. Benedict acted as Supervising Engineer on Bates Experimental Test Road for Illinois Division of Highways. At present Mr. Benedict is Assistant Chief Highway Engineer, State of Illinois, Division of Highways.

DANIEL COWAN JACKLING received degree of Bachelor of Science in Metallurgy in 1892, and in 1903 he received an advance degree of Metallurgical Engineer, Assistant Professor of Chemistry at the Missouri School of Mines immediately after graduation. Subsequent positions are: Chemist and Metallurgist, Cripple Creek District, Colorado, in charge of construction and operation Metallurgy Works of Consolidated Mercur Gold Mines, Mercur, Utah. At present Mr. Jackling is president Utah Copper Co., New Consolidated Copper Co., Butte & Superior Mining Co., Mesabi Iron Co., Bingham & Garfield Railroad Co., Gallup American Coal Co., Ray and Gila Valley Railroad Co.; vice-president Nevada Northern Railroad Co.; director Chase National Bank, Pacific Steamship Co., Braden Copper Co., Granby Consolidated Mining, Smelting and Power Co., Ltd., Transcontinental Air Transport, Kennecott Copper Corporation, Colonel on staff of Governor J. H. Peabody of Colorado, and Governor William Spry of Utah, commissioner to Seattle Exposition, Director government explosive plant, Assistant to U. S. Director of Purches, Storage and Traffic. Mr. Jackling was awarded the D. S. M. in 1919, Gold medal of the Mining and Metallurgical Society of America, and in 1930 he was awarded the William Lawrence Saunders Gold Medal.

JOHN W. PACK, '74, Mine Engineering. Held his first position with Trout Mines in Montana. Later Mr. Pack was affiliated with Miners Smelter Co., Shelby Smelter Co., and the United States Mint. Mr. Pack retired on annuity after serving thirty-one years as assayer in the United States Mint. Mr. Pack's most outstanding work is an improvement in the refining of base silver bullion.

RAY F. RUCKER '06. While in school Mr. Rucker received an "M" in baseball. He is a member of Sigma Nu fraternity. Mr. Rucker's first position was with Atlas Portland Cement Co., at Hannibal, Mo., as Mine Engineer. Later he was employed as Superintendent of Atlas Portland Cement Co., Quarry and Plant Superintendent, Lehigh Portland Cement Co. At present Mr. Rucker is General Superintendent of Aluminum Ore Co., East St. Louis, Illinois.

WILLIAM ROCK PAINTER, '08, received degree of Civil Engineer. Immediately after graduation Mr. Painter became connected with Colorado Mines, later he acted as County Surveyor and was employed by Missouri Pacific Railroad. Mr. Painter also acted as Lieutenant Governor, President of Missouri Prison Board, State Senator, and was a member of Governor's Survey Commission. At present Mr. Painter is Editor of the Carrollton Democrat, Carrollton, Mo.

JOHN A. GARCIA, '00, '03, received degree in Mine Engineering and Engineer of Mines. In 1928 he received Doctor of Engineering (Honoris Causa). Dr. Garcia's first position was with Western Coal and Mine Co., later he was employed by Consolidated Coal Co., Dering Coal Co., Brazil Block and Coal Co. At present Dr. Garcia is President of Allen & Garcia Co., McCormick Building, Chicago.

REGINALD S. DEAN, '15, Bachelor of Science in Geological Survey, Master of Science in Geological Survey in 1916, in 1922 he received a degree in Metallurgical Engineering. Mr. Dean was employed as chemist in Mallinotrodt Chemical Co. Later he was employed as Development Engineer, Western Electric Co., Inc. Mr. Dean's outstanding work is the development of dispersion hardening of lead alloys, particularly for use as cable sheathing. At present Mr. Dean is Chief Engineer, Metallurgical Division, United States Bureau of Mines.

MRS. EVA GREENE received a degree of Bachelor of Science in Mine Survey in 1911. After graduation Mrs. Greene was employed doing reconnaissance work on iron ore deposits in Southeast Missouri. Mrs. Greene was next employed by Mr. Buehler in the Missouri Geological Survey. Later she received an offer to go to Canada and make a survey of an iron ore deposit. She accepted the offer and traced the deposit thirty-five miles with a dip needle. In 1924 Mrs. Greene had copyrighted a plan involving world peace. At present Mrs. Greene is employed conducting her family affairs and working on her hobby, which is world peace.

MATHEW P. BRAZIL, Jr., '20, B. S. in M. E., Kappa Alpha, Theta Tau, Quo Vadis, "M" football, "M" track. Superintendent Sherardizing Plant, John Manville Co., Manville, New Jersey; St. Louis Department of Public Utilities, United Shoe Machinery Corporation as Engineer in charge of Construction; Manager Western Division, Wood Heel Co., U. S. M. C. At present Mr. Brazil is a Leather Broker with N. M. Taggart and Co.



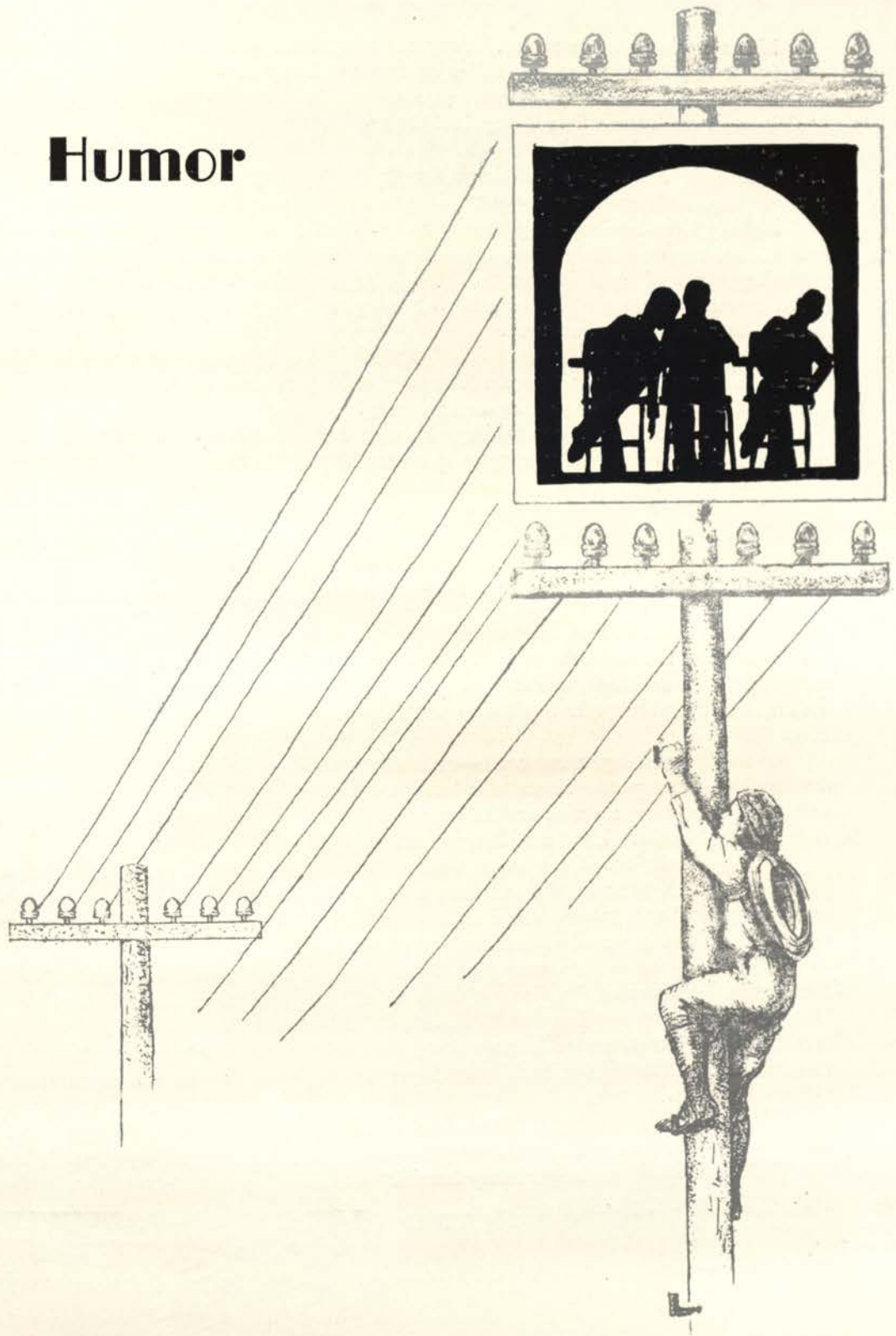


EUGENE McAULIFF received a degree of Doctor of Engineering (Honoris Causa) in 1927. Dr. McAuliff entered the services of the Northern Pacific Railroad as an apprentice, he was advanced until he became General Coal Agent. He served as President of Brazil Block Coal Co. and later as Vice-President of the North America Co. Dr. McAuliff was also connected with the West Kentucky Coal Co., Union Colliery Co., and Wayne Mining Co. At present Dr. McAuliff is President of the Union Pacific Coal Co.

KURT H. DE COUSSER, '22, received B.S. in M. E.; M.S. in M.E. In 1925 he received a degree of E.M. Lambda Chi Alpha, Square and Compass, M. S. M. Players, and Rollamo Board. Assistant Petroleum Geologist to late T. C. Sherwood with Josey Oil Co., of Okmulgee, Okla., Assistant Petroleum Geologist to T. W. Leach with Transcontinental Oil Co., Tulsa, Okla. Then Field Geologist for the same company. Discovered Yates Oil Field, Pecos County, Texas. Surveyed Lower Peninsula, Michigan, for the Vacuum Oil Co., and also surveyed for Prairie Oil Co., and the Transcontinental Oil Co. At present Mr. DeCousser is District Petroleum Geologist for the Vacuum Oil Co., Detroit, Michigan.

GEO. EASLEY received a Bachelor of Science degree in Mine Engineering in 1909 and Engineer of Mines in 1912. While in school Mr. Easley was a member of Kappa Alpha and Tau Beta Pi, manager of Rollamo Board, and President of Tau Beta Pi. Mr. Easley's first position was Superintendent of Pan American Tin Company. Subsequent positions were Manager of Ollo de Oro Gold Mining Company. Member of the firm of Easley and Inslee which owns and operates tin and tungsten properties in South America. At present Mr. Easley is Vice-President of International Mining Corporation; a member of the firm of Easley and Inslee, a partner in the firm of Coggeshall and Hicks, bankers and members of the New York Stock Exchange.

Humor



Men

Men are what women marry. They have two feet, two hands, and sometimes two wives; but never more than one dollar or one idea at a time.

Like Turkish cigarettes, men are all made of the same material, the only difference is that some are a little better disguised than others.

Generally speaking, they can be divided into three classes: husbands, bachelors and widowers. An eligible bachelor is a mass of obstinacy, entirely surrounded by suspicion. Husbands are three varieties: Prizes, Surprises and Consolation Prizes.

Making a husband out of a man is one of the highest plastic arts known to civilization. It requires science, sculpture, common sense, faith, hope, and charity, and the most important of these is charity. It is a psychological marvel that a soft, tender, violet-scented woman should enjoy kissing a big, awkward, stub-chinned, bay rum and tobacco-scented thing like a man.

If you flatter a man, it frightens him to death, and if you don't you bore him to death. If you permit him to make love to you, he gets tired of you in the end, and if you don't he gets tired of you in the beginning.

If you believe him in everything, you soon cease to interest him; and if you agree with him in anything, you soon cease to charm him. If you believe all he tells you, he thinks you are a fool, and if you don't he thinks you are a cynic.

If you wear gay colors and rouge and a startling hat, he hesitates to take you out; and if you wear a little brown hat, and plain clothes he takes you out and stares all evening at a woman in gay colors, rouge, and a startling hat.

Women

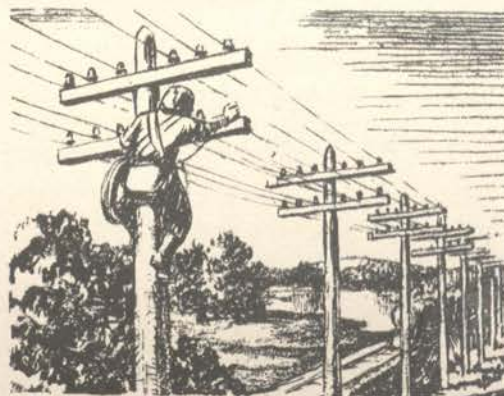
Women are what men have to marry—that is, if they marry anybody, which they usually do, for, as Saint Paul says, "It is better to marry than to burn." They likewise have two feet, two hands, and one great big tongue; they can always spend one or more dollars, and they always have about a thousand and one ideas—none of them worth a hoot.

Generally speaking, women are—generally speaking. Like all Gall, women can be divided into three parts: Those who have not been married, but want to be married; those who have been married and still are; and those who have been married and want to be married again. They are all surprises.

Making a wife out of a woman is the easiest thing known to man. All that has to be done is to tell 'em to wilt, and they wilt. It is a miracle of God that a great big strong he-man should take a second look at an insignificant little flibbertigibbet possessed of a total lack of any and all intelligence whatsoever.

If you compliment a woman, she thinks that your intentions must be, as in Brock Pemberton's production, "strictly dishonorable." If you make love to her, she says, "Sa-a-ay, where dya get that stuff? I ain't that kind of a girl." And if you don't she says, "Aw, yer too slow; go home and tell yer mother she wants you." But in either case, she tells all her girl friends everything that happens, to the accompaniment of a volley of giggles.

If she talks about her girl friends behind their backs and you don't agree with her, she retorts, "Well, what do you know about it?" And if you do agree with her, she says, "Why, I think you're perfectly horrid."



A gentleman is a guy who can talk to a chorus girl in her "costume" and say what he is thinking.

Smith: "Gee, if I don't look out I'll flunk out."

Jones: "Well, why don't you get hot and study?"

Smith: "That's the trouble, when I get hot I can't study."

End: "Did you make Whoopee at the party?"

Point: "Hell, didn't even know she was there."

Dutch: "Say, your dress scarcely covers your body."

Betty: "Well, what's wrong with my body?"

A rose blush crept over her cheeks like sunset across the autumn hills. "Really, you shouldn't do this. I'm the chaperone." "That's all right, lady, I'm only the janitor, myself."

"Pa."

"Yes, my son."

"What is a flapper?"

"A flapper, my son, is a woman who does what an old maid would like to do and has not the constitution to stand it."

Bill: "Do you fellows wash your clothes at the house?"

Burt: "Hell, no."

Bill: "Well, what's the washing machine for?"

Burt: "That's no washing machine. That's our cocktail shaker."

"Jimmy, do you want to see the little new baby the stork brought your mother?"

(After looking at baby): "Hell no, I want to see the stork."

The Old Maid: "Has the canary had its bath yet?"

The Maid: "Yes, he has, ma'am. You can come in now."

Speaking of efficiency, the loose-leaf system is said to have been used in the time of Adam.

The Ford is my chariot,
I shall not want another;
He maketh me lie down in wet places,
It destroyeth my soul.
It leads me into paths of ridicule
For its name's name;
It prepareth a breakdown before me
In the presence of mine enemies.

I will fear much evil
When it is with me;
Its rods and its shafts discomfort me,
It annointeth my face with oil,
Its water boileth over.
Surely if Lizzie follows me all of my life
I shall dwell in the house of nuts forever.



Well I'll be seein' ya," said the man as she shoulder straps of her evening gown broke.

Here's to the girl that's pure and chaste,
The purer she is the less she's chased.

Adam, after awaking from a deep sleep and viewing for the first time his helpmate in all her marvelous beauty, smiled broadly in amazed admiration as he began to count his remaining ribs. "I wonder," he mused, "if a man can do without all of his ribs."

Mary had a little skirt
So nice, so bright, so airy.
It never showed a speck of dirt
But showed a lot of Mary.

A modern girls is one who can meet the wolf at the door and come out with a fur coat.

"Dearest, where is my fraternity pin?"

"Why all of the boys complained that it scratched their hands, so I left it off."

He had been punished repeatedly and a paddling was an every-day occurrence. While his mother was out of the room he cautiously approached the table and picked up the magazine she had been reading. He became very interested in the highly colored ads and was eagerly perusing the one for Woodbury's soap when he heard her returning. Quickly he thrust the magazine under him and turned and surveyed her.

"Johnny! What are you sitting on?"

"The skin you love to touch, Mom!"

"You're the girl that lives next door, aren't you?"

"Why, yes, I am."

"Well, how come I haven't seen more of you?"

"Oh, you see, my room is on the other side of the house."

I know how ugly I are,
I know my face is no star,
But then I don't mind it,
Because I'm behind it—
It's the fellow in front what gets the jar.

WHO'S SORRY NOW?

He had proposed and the girl had turned him down.

"Ah, well," he sighed dejectedly, "I suppose I'll never marry now."

The girl couldn't help laughing a little, she was so flattered.

"You silly boy!" she said. "Because I've turned you down, that doesn't mean that other girls will do the same."

"Of course it does," he returned with a faint smile. "If you won't have me, who will?"

GONE TO PROTEST

Student (leaving college): "Good-bye, sir. I am indebted to you for all I know."
Prof. K. K. K.: "Don't mention such a trifle."



ONE DROP IN THE BUCKET

Four golfers were resting at the ninth green, which was behind a mound, when a battered ball came over the rise and rolled into a sandy trap. The player was not in view.

"Let's make him think he did it in one," said one of the golfers.

So they picked up his ball and put it in the hole.

Presently a weary player walked over the mound and looked about for his ball. The four men rose at him, shouting:

"Did you hit that ball? Bravo! It's in the hole!"

The player looked bewildered.

"Here's how it rolled," they said, tracing the course across the green. "A perfect shot! The right angle and the right strength! Bravo!"

The weary player pulled out a tattered score-card: "Good," said he, "that makes it 30 for this hole!"

EARLY WORMS WILL TURN

"You must wake and call me early, mother dear."

That was often said to mothers by the girls of yesteryear;

But the girls now tell their maters, as they sart out for a spin,

"You must wake up early, mother; some one's got to let me in."

BUT HER TEMPERATURE MIGHT RISE!

A man took his wife to a doctor, who put a thermometer into her mouth, and told her to keep her mouth shut for two or three minutes. When departing, the man tapped the doctor on the shoulder and said: "Say, Doc, what'll you take for that thing?"

SAUCE FOR THE GANDER

The boys of one of the professor's classes got a goose and tied it securely in his chair and pushed the chair under his desk, just before his expected arrival. He entered, pulled out his chair and saw the goose occupying it.

"I beg your pardone, gentlemen," said he, "I didn't know you were having a class meeting."

BOTH LEGAL AND HYGIENIC

An Aberdeen lady was buying a birthday present for her husband. In the men's furnishing department of a big store she asked for a collar, size sixteen. The assistant quickly found the appropriate box in which the collars were housed and inquired in mild surprise:

"Only one, madam?"

"Yes, certainly, only one," said the lady, haughtily. "Do ye think I'm a bigamist "

MISTERIOUS—VERY

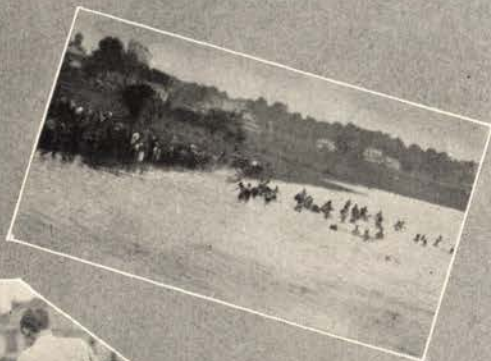
"Why is the ship going so slow?" an old lady asked the captain of a liner in a heavy fog.

"The fog, madame," the captain answered.

"But it's quite clear above," the old lady persisted.

"Maybe, madame, but we're not going that way unless the boilers burst."







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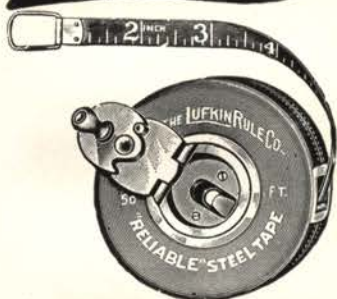
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